

S/M No:CN071N-010

Service Manual

TV / VCR Combination

CHASSIS : CN-071

MODEL : DVQ-13H1FC

DVQ-19H1FC

DVQ-13H2FC

DVQ-19H2FC



DAEWOO ELECTRONICS CO., LTD
[http : //svc.dwe.co.kr](http://svc.dwe.co.kr)

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SAFETY PRECAUTIONS

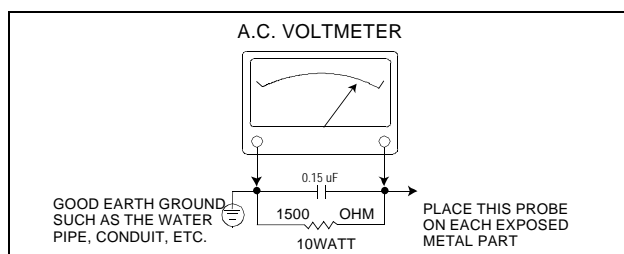
CAUTION : DO NOT ATTEMPT TO MODIFY THIS PRODUCT IN ANY WAY. NEVER PERFORM CUSTOMIZED INSTALLATIONS WITHOUT MANUFACTURER'S APPROVAL. UNAUTHORIZED MODIFICATIONS WILL NOT ONLY VOID THE WARRANTY, BUT MAY LEAD TO YOUR BEING LIABLE FOR ANY RESULTING PROPERTY DAMAGE OR USER INJURY. SERVICE WORK SHOULD BE PERFORMED ONLY AFTER YOU ARE THOROUGHLY FAMILIAR WITH ALL OF THE FOLLOWING SAFETY CHECKS AND SERVICING GUIDELINES. TO DO OTHERWISE, INCREASES THE RISK OF POTENTIAL HAZARDS AND INJURY TO THE USER. WHILE SERVICING, USE AN ISOLATION TRANSFORMER FOR PROTECTION FROM A.C. LINE SHOCK.

SAFETY CHECKS

AFTER THE ORIGINAL SERVICE PROBLEM HAS BEEN CORRECTED, A CHECK SHOULD BE MADE OF THE FOLLOWING:

SUBJECT: FIRE & SHOCK HAZARD

1. BE SURE THAT ALL COMPONENTS ARE POSITIONED IN SUCH A WAY AS TO AVOID POSSIBILITY OF ADJACENT COMPONENT SHORTS. THIS IS ESPECIALLY IMPORTANT ON THOSE MODULES WHICH ARE TRANSPORTED TO AND FROM THE REPAIR SHOP.
2. NEVER RELEASE A REPAIR UNLESS ALL PROTECTIVE DEVICES SUCH AS INSULATORS, BARRIERS, COVERS, SHIELDS, STRAIN RELIEFS, POWER SUPPLY CORDS, AND OTHER HARDWARE HAVE BEEN REINSTALLED PER ORIGINAL DESIGN. BE SURE, THAT THE SAFETY PURPOSE OF THE POLARIZED LINE PLUG HAS NOT BEEN DEFEATED.
3. SOLDERING MUST BE INSPECTED TO DISCOVER POSSIBLE COLD SOLDER JOINTS, SOLDER SPLASHES OF SHARP SOLDER POINTS. BE CERTAIN TO REMOVE ALL LOOSE FOREIGN PARTICLES.
4. CHECK FOR PHYSICAL EVIDENCE OF DAMAGE OR DETERIORATION TO PARTS AND COMPONENTS, FOR FRAYED LEADS, DAMAGED INSULATION (INCLUDING A.C. CORD), AND REPLACE IF NECESSARY. FOLLOW ORIGINAL LAYOUT, LEAD LENGTH AND DRESS.
5. NO LEAD OR COMPONENT SHOULD TOUCH A RECEIVING TUBE OR A RESISTOR RATED AT 1 WATT OR MORE. LEAD TENSION AROUND PROTRUDING METAL SURFACES MUST BE AVOIDED.
6. ALL CRITICAL COMPONENTS SUCH AS FUSES, FLAMEPROOF RESISTOR, CAPACITORS, ETC. MUST BE REPLACED WITH EXACT FACTORY TYPES. DO NOT USE REPLACEMENT COMPONENTS OTHER THAN THOSE SPECIFIED OR MAKE UNRECOMMENDED CIRCUIT MODIFICATIONS.
7. AFTER RE-ASSEMBLY OF THE SET ALWAYS PERFORM AN A.C. LEAKAGE TEST ON ALL EXPOSED METALLIC PARTS OF THE CABINET. (THE CHANNEL SELECTOR KNOB, ANTENNA TERMINALS, HANDLE AND SCREWS) TO BE SURE THE SET IS SAFE TO OPERATE WITHOUT DANGER OF ELECTRICAL SHOCK. DO NOT USE A LINE ISOLATION TRANSFORMER DURING THIS TEST USE AN A.C. VOLTMETER, HAVING 5000 OHMS PER VOLT OR MORE SENSITIVITY, IN THE FOLLOWING MANNER : CONNECT A 1500 OHM 10 WATT RESISTOR, PARALLELED BY A .15 MFD. 150V A.C. TYPE CAPACITOR BETWEEN A KNOWN GOOD EARTH GROUND (WATER PIPE, CONDUIT, ETC.) AND THE EXPOSED METALLIC PARTS, ONE AT A TIME. MEASURE THE A.C. VOLTAGE ACROSS THE COMBINATION OF 1500 OHM RESISTOR AND .15 MFD CAPACITOR. REVERSE THE A.C. PLUG AND REPEAT A.C. VOLTAGE MEASUREMENTS FOR EACH EXPOSED METALLIC PART. VOLTAGE MEASURED MUST NOT EXCEED .75 VOLTS R.M.S THIS CORRESPONDS TO 0.5 MILLIAMPS A.C. ANY VALUE EXCEEDING THIS LIMIT CONSTITUTES A POTENTIAL SHOCK HAZARD AND MUST BE CORRECTED IMMEDIATELY.



SUBJECT : GRAPHIC SYMBOLS



THE LIGHTNING FLASH WITH ARROWHEAD SYMBOL, WITHIN AN EQUILATERAL TRIANGLE, IS INTENDED TO ALERT THE SERVICE PERSONNEL TO THE PRESENCE OF UNINSULATED "DANGEROUS VOLTAGE" THAT MAY BE OF SUFFICIENT MAGNITUDE TO CONSTITUTE A RISK OF ELECTRIC SHOCK.



THE EXCLAMATION POINT WITHIN AN EQUILATERAL TRIANGLE IS INTENDED TO ALERT THE SERVICE PERSONNEL TO THE PRESENCE OF IMPORTANT SAFETY INFORMATION ON SERVICE LITERATURE.

SUBJECT : X-RADIATION

1. BE SURE PROCEDURES AND INSTRUCTIONS TO ALL SERVICE PERSONNEL COVER THE SUBJECT OF X-RADIATION. THE ONLY POTENTIAL SOURCE OF X-RAYS IN CURRENT T.V. RECEIVERS IS THE PICTURE TUBE. HOWEVER, THIS TUBE DOES NOT EMIT X-RAYS WHEN THE HIGH VOLTAGE IS AT THE FACTORY SPECIFIED LEVEL. THE PROPER VALUE IS GIVEN IN THE APPLICABLE SCHEMATIC. OPERATION AT HIGHER VOLTAGES MAY CAUSE A FAILURE OF THE PICTURE TUBE OR HIGH VOLTAGE SUPPLY AND, UNDER CERTAIN CIRCUMSTANCES, MAY PRODUCE RADIATION IN EXCESS OF DESIRABLE LEVELS.
2. ONLY FACTORY SPECIFIED C.R.T ANODE CONNECTORS MUST BE USED. DEGAUSSING SHIELDS ALSO SERVE AS X-RAY SHIELD IN COLOR SETS. ALWAYS RE-INSTALL THEM.
3. IT IS ESSENTIAL THAT SERVICE PERSONNEL HAVE AVAILABLE AN ACCURATE AND RELIABLE HIGH VOLTAGE METER. THE CALIBRATION OF THE METER SHOULD BE CHECKED PERIODICALLY AGAINST A REFERENCE STANDARD. SUCH AS THE ONE AVAILABLE AT YOUR DISTRIBUTOR.
4. WHEN THE HIGH VOLTAGE CIRCUITRY IS OPERATING PROPERLY THERE IS NO POSSIBILITY OF AN X-RADIATION PROBLEM. EVERY TIME A COLOR CHASSIS IS SERVICED, THE BRIGHTNESS SHOULD BE RUN UP AND DOWN WHILE MONITORING THE HIGH VOLTAGE WITH A METER TO BE CERTAIN THAT THE HIGH VOLTAGE DOES NOT EXCEED THE SPECIFIED VALUE AND THAT IT IS REGULATING CORRECTLY. WE SUGGEST THAT YOU AND YOUR SERVICE ORGANIZATION REVIEW TEST PROCEDURES SO THAT VOLTAGE REGULATION IS ALWAYS CHECKED AS A STANDARD SERVICING PROCEDURE, AND THAT THE HIGH VOLTAGE READING BE RECORDED ON EACH CUSTOMER'S INVOICE.
5. WHEN TROUBLESHOOTING AND MAKING TEST MEASUREMENTS IN A PRODUCT WITH A PROBLEM OF EXCESSIVE HIGH VOLTAGE, AVOID BEING UNNECESSARILY CLOSE TO THE PICTURE TUBE AND THE HIGH VOLTAGE SUPPLY. DO NOT OPERATE THE PRODUCT LONGER THAN IS NECESSARY TO LOCATE THE CAUSE OF EXCESSIVE VOLTAGE.
6. REFER TO HV, B+ AND SHUTDOWN ADJUSTMENT PROCEDURES DESCRIBED IN THE APPROPRIATE SCHEMATIC AND DIAGRAMS (WHERE USED).

SUBJECT : IMPLSION

1. ALL DIRECT VIEWED PICTURE TUBES ARE EQUIPPED WITH AN INTEGRAL IMPLSION PROTECTION SYSTEM. BUT CARE SHOULD BE TAKEN TO AVOID DAMAGE DURING INSTALLATION. AVOID SCRATCHING THE TUBE. OF SCRATCHED REPLACE IT.
2. USE ONLY RECOMMENDED FACTORY REPLACEMENT TUBES.

SUBJECT : TIPS ON PROPER INSTALLATION

1. NEVER INSTALL ANY PRODUCT IN A CLOSED-IN RECESS, CUBBYHOLE OR CLOSELY FITTING SHELF SPACE, OVER OR CLOSE TO HEAT DUCT, OR IN THE PATH OF HEATED AIR FLOW.
2. AVOID CONDITIONS OF HIGH HUMIDITY SUCH AS: OUTDOOR PATIO INSTALLATIONS WHERE DEW IS A FACTOR, NEAR STEAM RADIATORS WHERE STEAM LEAKAGE IS A FACTOR, ETC.
3. AVOID PLACEMENT WHERE DRAPERIES MAY OBSTRUCT REAR VENTING. THE CUSTOMER SHOULD ALSO AVOID THE USE OF DECORATIVE SCARVES OR OTHER COVERINGS WHICH MIGHT OBSTRUCT VENTILATION.
4. WALL AND SHELF MOUNTED INSTALLATIONS USING A COMMERCIAL MOUNTING KIT, MUST FOLLOW THE FACTORY APPROVED MOUNTING INSTRUCTIONS. A PRODUCT MOUNTED TO A SHELF OR PLATFORM MUST RETAIN ITS ORIGINAL FEET (OR THE EQUIVALENT THICKNESS IN SPACERS) TO PROVIDE ADEQUATE AIR FLOW ACROSS THE BOTTOM. BOLTS OR SCREWS USED FOR FASTENERS MUST NOT TOUCH ANY PARTS OR WIRING. PERFORM LEAKAGE TEST ON CUSTOMIZED INSTALLATIONS.
5. CAUTION CUSTOMERS AGAINST THE MOUNTING OF A PRODUCT ON SLOPING SHELF OR A TILTED POSITION, UNLESS THE PRODUCT IS PROPERLY SECURED.
6. A PRODUCT ON A ROLL-ABOUT CART SHOULD BE STABLE ON ITS MOUNTING TO THE CART. CAUTION THE CUSTOMER ON THE HAZARDS OF TRYING TO ROLL A CART WITH SMALL CASTERS ACROSS THRESHOLDS OR DEEP PILE CARPETS.
7. CAUTION CUSTOMERS AGAINST THE USE OF A CART OR STAND WHICH HAS NOT BEEN LISTED BY UNDERWRITERS LABORATORIES, INC. FOR USE WITH THEIR SPECIFIC MODEL OF TELEVISION RECEIVER OR GENERALLY APPROVED FOR USE WITH T.V.S OF THE SAME OR LARGER SCREEN SIZE.
8. CAUTION CUSTOMERS AGAINST THE USE OF EXTENSION CORDS, EXPLAIN THAT A FOREST OF EXTENSIONS SPROUTING FROM A SINGLE OUTLET CAN LEAD TO DISASTROUS CONSEQUENCES TO HOME AND FAMILY.

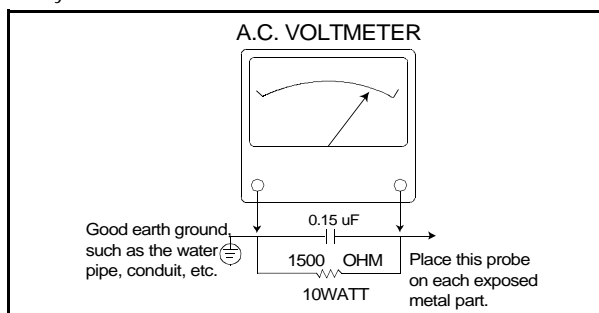
CAUTION : Do not attempt to modify this product in any way. Unauthorized modifications will not only void the warranty, but may lead to your being liable for any resulting property damage or user injury. Service work should be performed only after you are thoroughly familiar with all of the following safety checks and servicing guidelines. To do otherwise, increases the risk of potential hazards and injury to the user.

SAFETY CHECKS

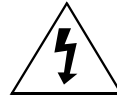
After the original service problem has been corrected, a check should be made of the following:

SUBJECT : FIRE & SHOCK HAZARD

1. Be sure that all components are positioned in such a way as to avoid possibility of adjacent component shorts. This is especially important on those chassis which are transported to and from the repair shop.
2. Never release a repair unless all protective devices such as insulators, barriers, covers, shields, strain reliefs, and other hardware have been reinstalled per original design.
3. Soldering must be inspected to discover possible cold solder joints, frayed leads, damaged insulation (including A.C. cord), solder splashes or sharp solder points. Be certain to remove all loose foreign particles.
4. Check for physical evidence of damage or deterioration to parts and components, and replace if necessary follow original layout, lead length and dress.
5. No leads or components should touch a receiving tube or a resistor rated at 1 watt or more. Lead tension around protruding metal surfaces must be avoided.
6. All critical components such as fuses, flameproof resistors, capacitors, etc. must be replaced with exact factory types. Do not use replacement components other than those specified or make unrecommended circuit modifications.
7. After re-assembly of the set always perform an A.C. leakage test on all exposed metallic parts of the cabinet, (the channel selector knob, antenna terminals, handle and screws) to be sure the set is safe to operate without danger of electrical shock. Do not use a line isolation transformer during this test. Use an A.C. voltmeter, having 5000 ohms per volt or more sensitivity, in the following manner : connect a 1500 ohm 10 watt resistor, paralleled by a 0.15 mfd. 150V A.C. type capacitor between a known good earth ground (water pipe, conduit, etc.) and the exposed metallic parts, one at a time. Measure the A.C. voltage across the combination of 1500 ohm resistor and 0.15 MFD capacitor. Reverse the A.C. plug and repeat A.C. voltage measurements for each exposed metallic part. Voltage measured must not exceed 0.75 volts R.M.S. This corresponds to 0.5 milliamp A.C. Any value exceeding this limit constitutes a potential shock hazard and must be corrected immediately.



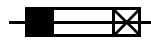
GRAPHIC SYMBOLS :



The lightning flash with arrowhead symbol, within an equilateral triangle, is intended to alert the service personnel to the presence of uninsulated "dangerous voltage" that may be of sufficiently magnitude to constitute a risk of electric shock.



The exclamation point within an equilateral triangle is intended to alert the service personnel to the presence of important safety information in service literature.



Fuse symbol is printed on pcb adjacent to the fuse, with "RISK OF FIRE REPLACE FUSE AS MARKED". The symbol is explained in the service manual with the following wording or equivalent.

"CAUTION : FOR CONTINUED PROTECTION AGAINST FIRE HAZARD, REPLACE ONLY WITH SAME TYPE (6.3A, 250V)" and **"ATTENTION:** AFIN D'ASSURER UNE PROTECTION PERMANENTE CONTRE LES RISQUES D'INCENDIE, REMPLACER UNIQUEMENT PAR UN FUSIBLE DE MEME TYPE ET DE "6.3A, 250V".

SUBJECT : X-RADIATION

1. Be sure procedures and instructions to all service personnel cover the subject of X-rays in current T.V. receivers is the picture tube. However, this tube does not emit X-rays when the high voltage is at the factory specified level. The proper value is given in the applicable schematic. Operation at higher voltages may cause a failure of the picture tube or high voltage supply and, under certain circumstances, may produce radiation in excess of desirable levels.
2. Only factory specified C.R.T. anode connectors must be used. Degaussing shields also serve as X-ray shield in color sets. Always re-install them.
3. It is essential that the serviceman has available an accurate and reliable high voltage meter. The calibration of the meter should be checked periodically against a reference standard. Such as the one available at your distributor.
4. When the high voltage circuitry is operating properly there is no possibility of an X-radiation problem. Every time a color chassis is serviced, the brightness should be run up and down while monitoring the high voltage with a meter to be certain that the high voltage does not exceed the specified value and that it is regulating correctly. We suggest that you and your service organization review test procedures so that voltage regulation is always checked as a standard servicing procedure. And that the high voltage reading be recorded on each customer's invoice.
5. When troubleshooting and making test measurements in a receiver with a problem of excessive high voltage, avoid being unnecessarily close to the picture tube and the high voltage compartment. Do not operate the chassis longer than is necessary to locate the cause of excessive voltage.
6. Refer to HV, B+ and Shutdown adjustment procedures described in the appropriate schematic and diagrams (where used).

SAFETY PRECAUTIONS

SUBJECT : IMPLOSION

1. All direct viewed picture tubes are equipped with an integral implosion protection system, but care should be taken to avoid damage during installation. Avoid scratching the tube. If scratched, replace it.
2. Use only recommended factory replacement tubes.

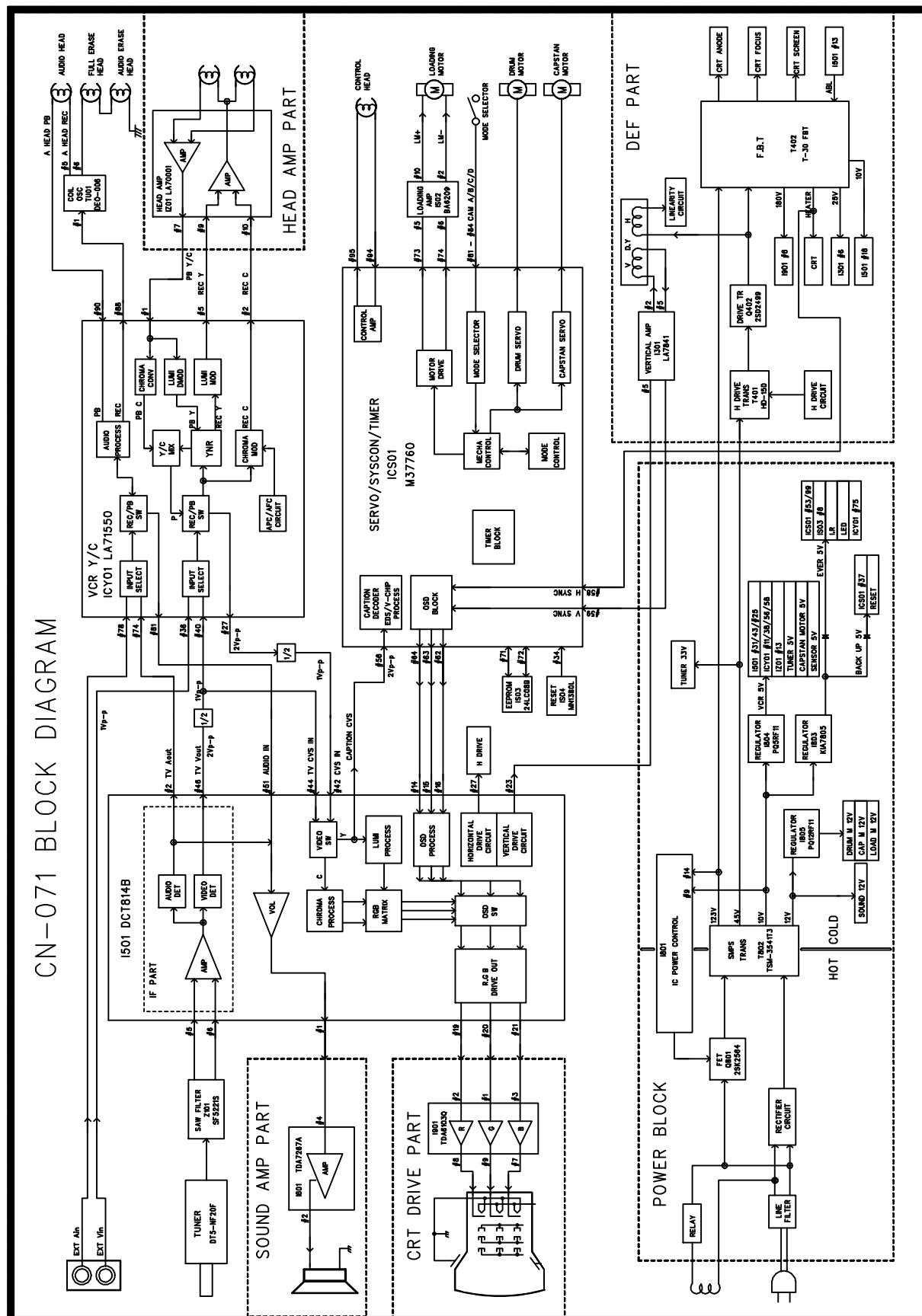
SUBJECT : TIPS ON PROPER INSTALLATION

1. Never install any receiver in closed-in recess, cubbyhole or closely fitting shelf space over, or close to heat duct, or in the path of heated air flow.
2. Avoid conditions of high humidity such as : Outdoor patio installations where dew is a factor. Near steam radiators where steam leakage is a factor, etc.
3. Avoid placement where draperies may obstruct rear venting. The customer should also avoid the use of decorative scarves or other coverings which might obstruct ventilation.
4. Wall and shelf mounted installations using a commercial mounting kit, must follow the factory approved mounting instructions. A receiver mounted to a shelf or platform must retain its original feet(or the equivalent thickness in spacers) to provide adequate air flow across the bottom, bolts or screws used for fasteners must not touch and parts or wiring. Perform leakage test on customized installations.
5. Caution customers against the mounting of a receiver on sloping shelf or a tilted position, unless the receiver is properly secured.
6. A receiver on a roll-about cart should be stable on its mounting to the cart. Caution the customer on the hazards of trying to roll a cart with small casters across thresholds or deep pile carpets.
7. Caution customers against the use of a cart or stand which has not been listed by underwriters laboratories, inc. For use with their specific model of television receiver or generically approved for use with T.V.'s of the same or larger screen size.

SPECIFICATION

| ITEMS | MODEL | DVQ-13/19H1FC, DVQ-13/19H2FC | REMARK |
|---------------|--------------------------|---|--------|
| TV SECTION | STANDARD | NTSC-M | |
| | TUNING SYSTEM | Frequency Synthesizer(FS) Tuning System | |
| | TUNING RANGE | VHF : 2 - 13(12) UHF : 14 - 69(56) CATV : 1-125(125) | |
| | ANTENNA INPUT IMPEDENCE | 75 ohm Unbalanced | |
| | AUXILIARY INPUT TERMINAL | Front : Video, Audio | |
| VIDEO SECTION | FORMAT | VHS NTSC Standard | |
| | VCR SYSTEM | Rotary 2-Head Helical Scanning Monaural System | |
| | AUDIO RECORDING SYSTEM | Monaural | |
| | TAPE SPEED | SP:33.35mm/sec; EP:11.12mm/sec LP:16.67mm/sec PLAY ONLY | |
| | INPUT | Video :1Vp-p,75 Ohm Audio :3.8dBm, over 100K Ohm | |
| | TIMER PROGRAMING | 6 Event/1 Month | |
| GENERAL | POWER INPUT | AC 120V 60Hz | |
| | POWER CONSUMPTION | 13=60W 19=70W | |
| | SOUND OUTPUT | 1.3W | |
| | SPEAKER | 3W 8 OHM | |
| | OPRATING TEMPERATRE | 5 °C to 40 °C | |
| | REMOTE CONTROL | R-39A02 | |
| | SPECIAL FUNTION | 3-Language OSD With CAPTION Parental Control K-MECHA One Touch Record Repeat Play Energy Star Power (Stand-By:2W Under) | |

BLOCK DIAGRAM



CN-071 CONNECTION DIAGRAM

PCB MAIN

VIDEO HEAD

FE HEAD

PCB A/C HEAD

PH01

OPTION

TO ADJ. JIG

PCB CRT

PCB CAPSTAN MOTOR

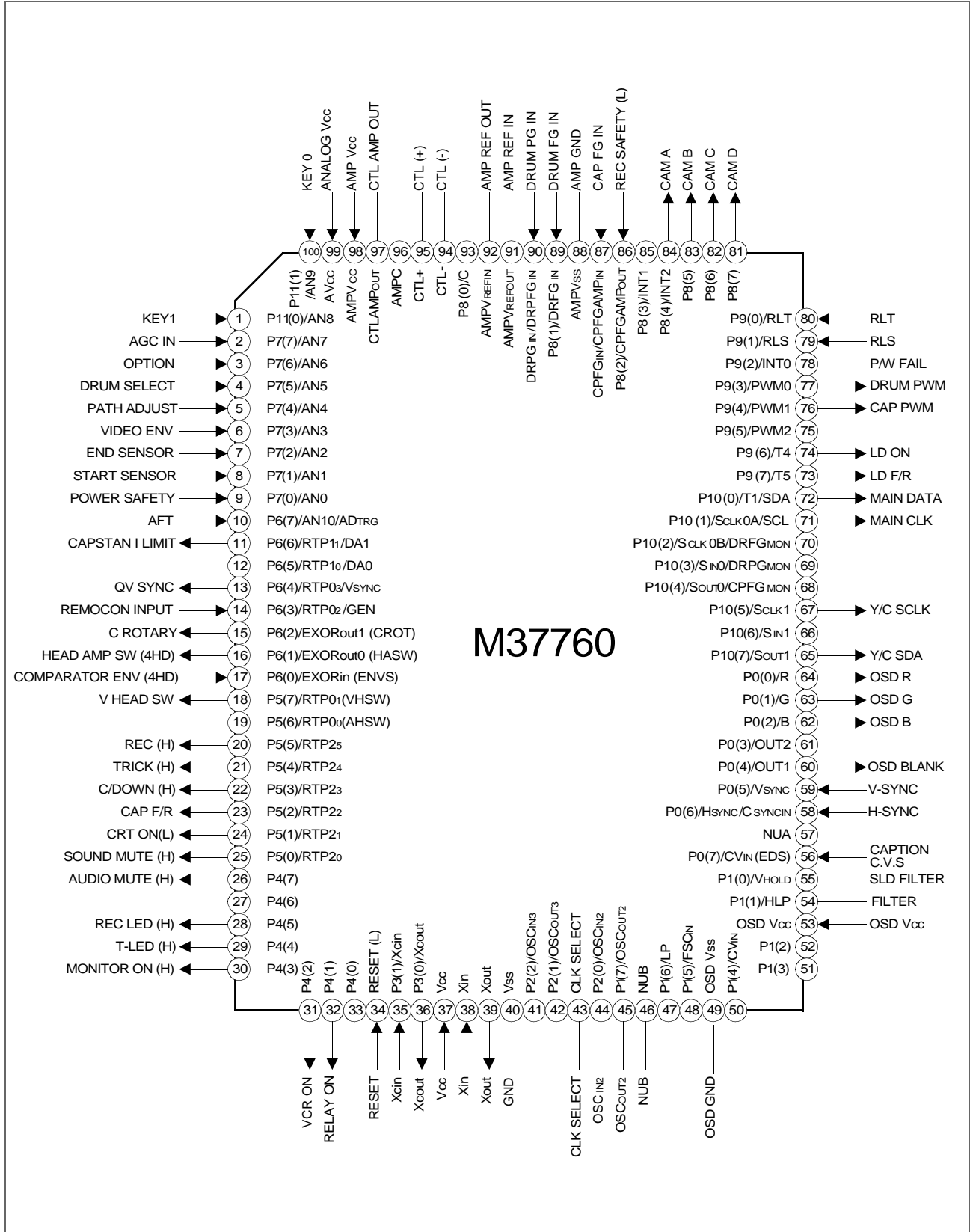
PCB DRUM MOTOR

PCB LOADING MOTOR

IC DESCRIPTION

ICS01

DW37760MCA-AA1(M37760) : IC TIMER / SYSCON / CTL PROCESSOR



1. SYSTEM FEATURE

- 1) The system for TV/VCR tuning is Frequency Synthesis type.
- 2) VCR SERVO Controller is interior designed.
- 3) Closed Caption function is interior designed.
- 4) Parental Control function is interior designed.
- 5) On Screen Display function is interior designed.
- 6) Package : 100PIN QFP
- 7) Tuner (Pre-scaler) : IIC BUS
/PLL IC : TAU 6014-S (SIEMENS)
- 8) REMOCON : The IC of transmission (MITSUBISHI M50560)
- 9) EEPROM : 24AT08 (IIC BUS)
- 10) 10-Local Key : A/D input control
(KEY 0 : REC, REW, PLAY, FF, STOP/EJECT)
(KEY 1 : POWER, CH UP/DOWN, VOL UP/DOWN)
- 11) Option S/W : Port A/D input Option check
- 12) IF/V/C/D IC : DCT814B (LA76814B)
- 13) VCR Y/C/A IC : LA71550M
- 14) DECK MECHANISM : K-MECHA

IC DESCRIPTION

2. PIN DESCRIPTION

| Pin | Terminal | Name | Explanation | Remarks |
|-----|----------|---------------------|---|---|
| 1 | P11(0) | KEY 1 IN | Power, Ch up/down, Vol up/down | |
| 2 | P7(7) | AGC IN | Connect this port to AGC of Tuner. Default voltage :3.75V Variable voltage : 3.25V, 3.5V, 3.75V | |
| 3 | P7(6) | OPTION | H(5V) : Parental control M(2.5V) : Child lock L(0V) : None | |
| 4 | P7(5) | DRUM SELECT | H(5V) : NTSC 4 head L(0V) : NTSC 2 head | |
| 5 | P7(4) | PATH ADJUST | Automatic PATH adjust | |
| 6 | P7(3) | VIDEO ENVELOPE IN | Connect this port to 6 pin of IZ01. Maximum point search DC ENVE input. Auto tracking restart condition (SP:2.5V, LP/SLP:1.5-5V) | |
| 7 | P7(2) | END SENSOR IN | Tape END sensor detect input. H: Tape end. | |
| 8 | P7(1) | START SENSOR IN | Tape START sensor detect input. H: Tape start. | |
| 9 | P7(0) | POWER SAFETY IN | Connect this port to 26V of FBT. FBT protect port. Detect voltage: 3V under → Hold down | |
| 10 | P6(7) | AFT IN | DC voltage that comes from the 10 pin of DCT814B | |
| 11 | P6(6) | CAPSTAN I LIMIT OUT | Limit the current of CAPSTAN MOTOR Set "L" during PAUSE/STILL | |
| 12 | P6(5) | | Not used | |
| 13 | P6(4) | QV SYNC | When special play, Quasi Vertical SYNC insert V SYNC of C.V.S | Special play: QUE,REV, STILL,SLOW |
| 14 | P6(3) | REMOCON INPUT | Remote Controller pulse input | |
| 15 | P6(2) | COLOR ROTARY OUT | When color MOD/DEMODO, phase shift pulse | |
| 16 | P6(1) | HEAD AMP SW PULSE | 4 head option. When special play, EP head switching pulse | |
| 17 | P6(0) | COMPARATOR ENV | 4 head option. | |
| 18 | P5(7) | V HEAD SW PULSE | Video head switching pulse(SP head). | |
| 19 | P5(6) | A HEAD SW PULSE | 6 head option. Not used | |
| 20 | P5(5) | REC H | When recording, set "H" | |
| 21 | P5(4) | TRICK H | When special play, set "H" | |
| 22 | P5(3) | CASSETTE DOWN H | When cassette insert, light up IR led. | |
| 23 | P5(2) | CAPSTAN F/R | Switching forward(H) and reverse(L) of CAPSTAN MOTOR | |
| 24 | P5(1) | CRT ON L | When CRT off, set "H" during 1sec. | |
| 25 | P5(0) | SOUND MUTE H | When stand by TV/VCR, set speaker sound mute. | |

| Pin | Terminal | Name | Explanation | Remarks |
|-----|----------|-----------------|--|---------|
| 26 | P4(7) | AUDIO MUTE H | Connect this port to 95 pin of ICY01. When special play, set audio mute. | |
| 27 | P4(6) | | Not used | |
| 28 | P4(5) | REC LED H | Light up LED(RED) when recording | |
| 29 | P4(4) | TIMER REC LED H | Light up LED(GREEN) when ready to programming record. | |
| 30 | P4(3) | MONITOR ON H | When CRT on, set "H". | |
| 31 | P4(2) | VCR ON H | Recording when CRT off, set "H" | |
| 32 | P4(1) | RELAY ON H | When CRT on, relay on during 1sec. | |
| 33 | P4(0) | | Not used | |
| 34 | RESET | RESET(L) | RESET | |
| 35 | P3(1) | Xcin | It uses 32.768KHz Crystal. 35 pin is input terminal for crystal oscillator 36 pin is output terminal for crystal oscillator | |
| 36 | P3(0) | Xcout | | |
| 37 | Vcc | Vcc | Ever +5V($\pm 0.5V$). Positive power supply | |
| 38 | Xin | Xin | It uses 16MHz Crystal. 38 pin is input terminal for crystal oscillator 39 pin is output terminal for crystal oscillator | |
| 39 | Xout | Xout | | |
| 40 | Vss | Vss | GND Negative power supply. | |
| 41 | P2(2) | OSCin3 | Not used | |
| 42 | P2(1) | OS Cout3 | Not used | |
| 43 | | CLK SELECT | When MICOM to start, decide to 32.768KHz or 16MHz. Set "L" : 32.768KHz | |
| 44 | P2(0) | OSCin2 | It uses LC oscillator. Set the OSD position. 38 pin is input terminal for LC oscillator 39 pin is output terminal for LC oscillator | |
| 45 | P1(7) | OS Cout2 | | |
| 46 | NUB | NUB | GND | |
| 47 | P1(6) | LP H | Not used | |
| 48 | P1(5) | FSC IN | Not used | |
| 49 | Vcc | OSD Vss | GND | |
| 50 | P1(4) | CVS IN | Not used | |
| 51 | P1(3) | LECHA | Not used | |
| 52 | P1(2) | | Not used | |
| 53 | Vcc | OSD Vcc | Ever +5V ($\pm 0.5V$). | |
| 54 | P1(1) | FILTER | Filter terminal for PLL. | |
| 55 | P1(0) | SLD FILTER | Filter terminal for SYNC separate. | |
| 56 | P0(7) | C.V.S IN | For Caption and Parental control signal detect. | |
| 57 | NUA | NUA | GND | |
| 58 | P0(6) | H SYNC IN | For OSD horizontal SYNC input | |
| 59 | P0(5) | V SYNC IN | For OSD vertical SYNC input | |

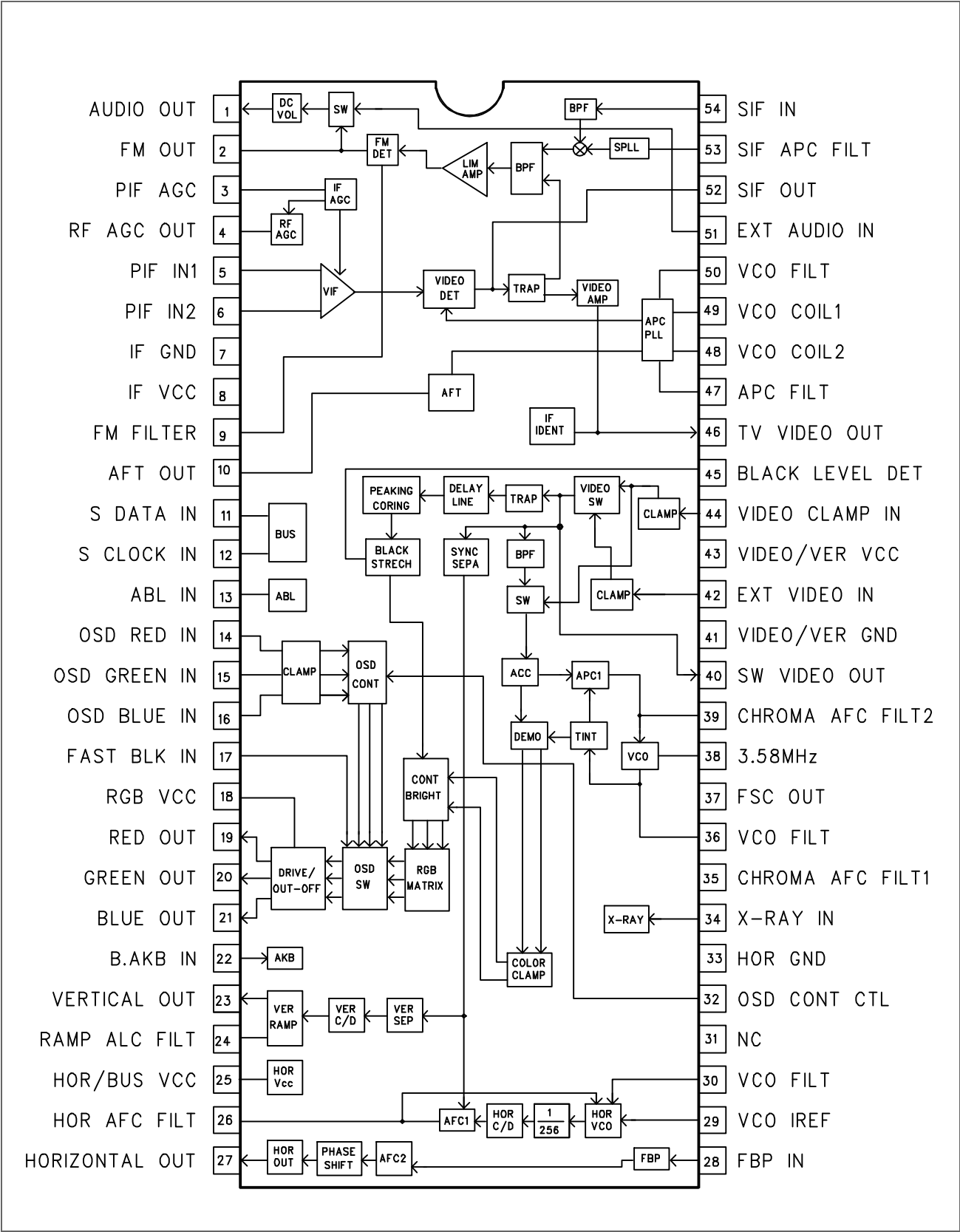
IC DESCRIPTION

| Pin | Terminal | Name | Explanation | Remarks | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|----------|----------|-----------------|---|---------|---|---|---|---|-------|---|---|---|---|----------|---|---|---|---|-----|---|---|---|---|------|---|---|---|---|------|---|---|---|---|--------|---|---|---|---|--|
| 60 | P0(4) | OSD BLANK OUT | Fast blanking control signal. Switch TV image signal and Caption/OSD image signal. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 61 | P0(3) | | Not used | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 62 | P0(2) | OSD B OUT | Blue output terminal of OSD image. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 63 | P0(1) | OSD G OUT | Green output terminal of OSD image. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 64 | P0(0) | OSD R OUT | Red output terminal of OSD image. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 65 | P10(7) | S DATA | IIC data I/O. Control VCR Y/C, TUNER, EEPROM | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 66 | P10(6) | | Not used | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 67 | P10(5) | S CLOCK | IIC clock output | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 68 | P10(4) | CAP PG mon | Not used | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 69 | P10(3) | DRUM PG mon | Not used | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 70 | P10(2) | DRUM FG mon | Not used | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 71 | P10(1) | M CLOCK | IIC clock output | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 72 | P10(0) | M DATA | IIC data I/O. Control CHROMA IC | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 73 | P9(7) | LD F/R | Loading Motor Forward(L)/Reverse(H) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 74 | P9(6) | LD ON | When operate Loading Motor, set "H" | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 75 | P9(5) | PWM2 | Not used | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 76 | P9(4) | CAPSTAN PWM | Control rotate speed of Capstan Motor. Period of PWM : 23.4KHz | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 77 | P9(3) | DRUM PWM | Control rotate speed of Drum Motor. Period of PWM : 23.4KHz | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 78 | P9(2) | POWER FAIL | Input "L", MICOM is Hold mode. Backup time approx. 30minute. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 79 | P9(1) | RLS IN | Supply reel/Take up reel pulse input terminal. Use to check the Tape remain or high speed rewind and fast forward. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 80 | P9(0) | RLT IN | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 81 | P8(7) | CAM D | CAM detection input terminal. <table><tr><th>MODE</th><th>A</th><th>B</th><th>C</th><th>D</th></tr><tr><td>EJECT</td><td>L</td><td>H</td><td>H</td><td>H</td></tr><tr><td>STAND BY</td><td>L</td><td>H</td><td>L</td><td>H</td></tr><tr><td>REV</td><td>H</td><td>H</td><td>L</td><td>H</td></tr><tr><td>STOP</td><td>H</td><td>H</td><td>H</td><td>L</td></tr><tr><td>PLAY</td><td>H</td><td>H</td><td>H</td><td>L</td></tr><tr><td>FF/REW</td><td>H</td><td>L</td><td>H</td><td>L</td></tr></table> | MODE | A | B | C | D | EJECT | L | H | H | H | STAND BY | L | H | L | H | REV | H | H | L | H | STOP | H | H | H | L | PLAY | H | H | H | L | FF/REW | H | L | H | L | |
| MODE | A | B | | C | D | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EJECT | L | H | | H | H | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| STAND BY | L | H | | L | H | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| REV | H | H | | L | H | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| STOP | H | H | | H | L | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| PLAY | H | H | | H | L | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| FF/REW | H | L | H | L | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 82 | P8(6) | CAM C | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 83 | P8(5) | CAM B | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 84 | P8(4) | CAM A | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 85 | P8(3) | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 86 | P8(2) | REC SAFETY SW L | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 87 | | CAP PG IN | Capstan Pulse Generator signal input. Feed back Capstan rotation speed. | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 88 | Vss | AMPVss | GND | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |

| Pin | Terminal | Name | Explanation | Remarks |
|-----|----------|-------------|--|---------|
| 89 | P8(1) | DRUM FG IN | Drum Frequency Generator signal input. Feed back Drum rotation speed. | |
| 90 | | DRUM PG IN | Drum Pulse Generator signal input. Feed back Drum rotation phase. | |
| 91 | | AMP REF IN | Control pulse AMP reference input terminal. | |
| 92 | | AMP REF OUT | Control pulse AMP reference output terminal. | |
| 93 | P8(0) | C | AMP filter. | |
| 94 | | CTL- | Input control pulse when playing. | |
| 95 | | CTL+ | Output control pulse when recording. | |
| 96 | | AMP C | AMP condenser. | |
| 97 | | CTL AMP OUT | Check Control pulse. | |
| 98 | Vcc | AMP Vcc | Ever +5V ($\pm 0.5V$). | |
| 99 | Vcc | ANALOG Vcc | Ever +5V ($\pm 0.5V$). | |
| 100 | P11(1) | KEY 0 IN | REC, REW, PLAY, FF, STOP/EJECT | |

IC501
DCT814B(LA76814B) : IC VIDEO PROCESSOR

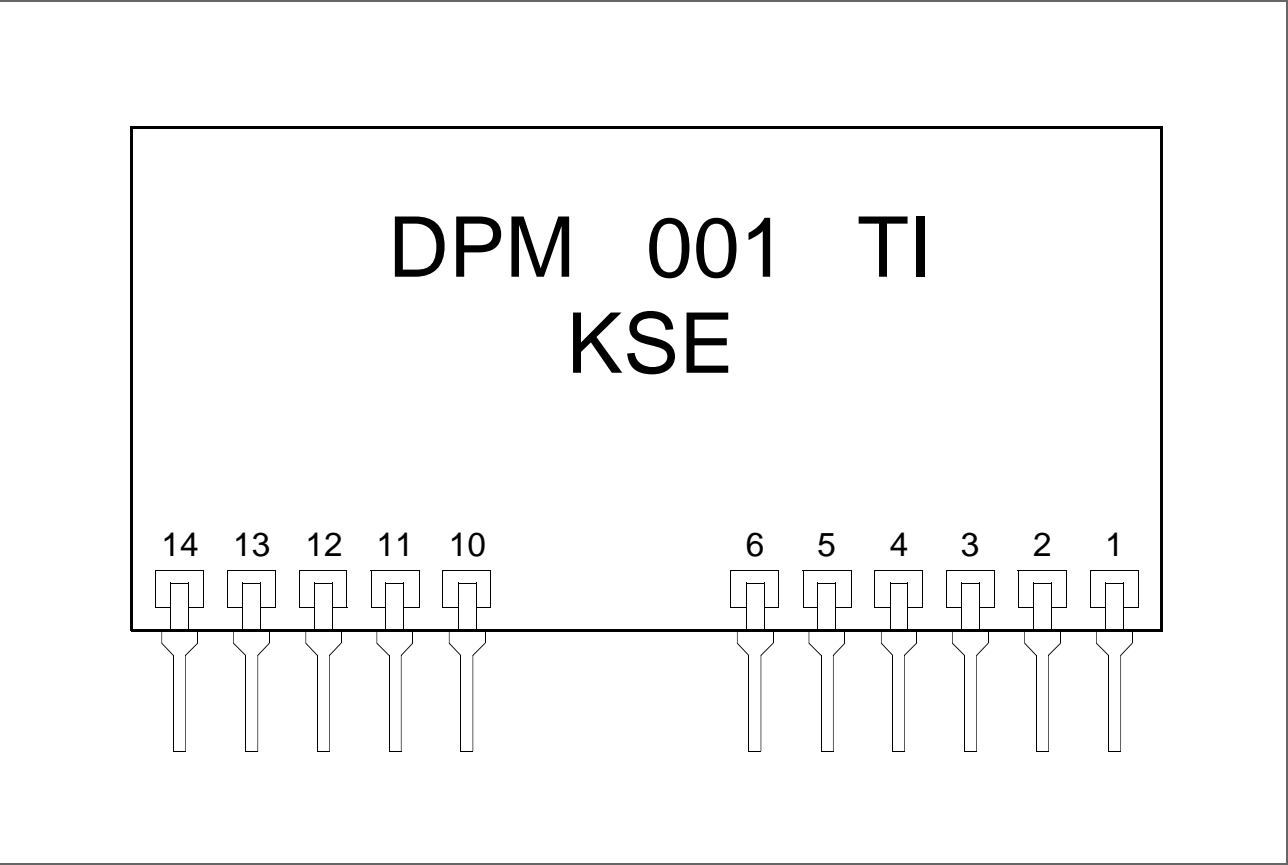
IC501
DCT814B(LA76814B) : IC VIDEO PROCESSOR





| |
|----------------|
| IC DESCRIPTION |
|----------------|

I801
POWER CONTROL MODULE

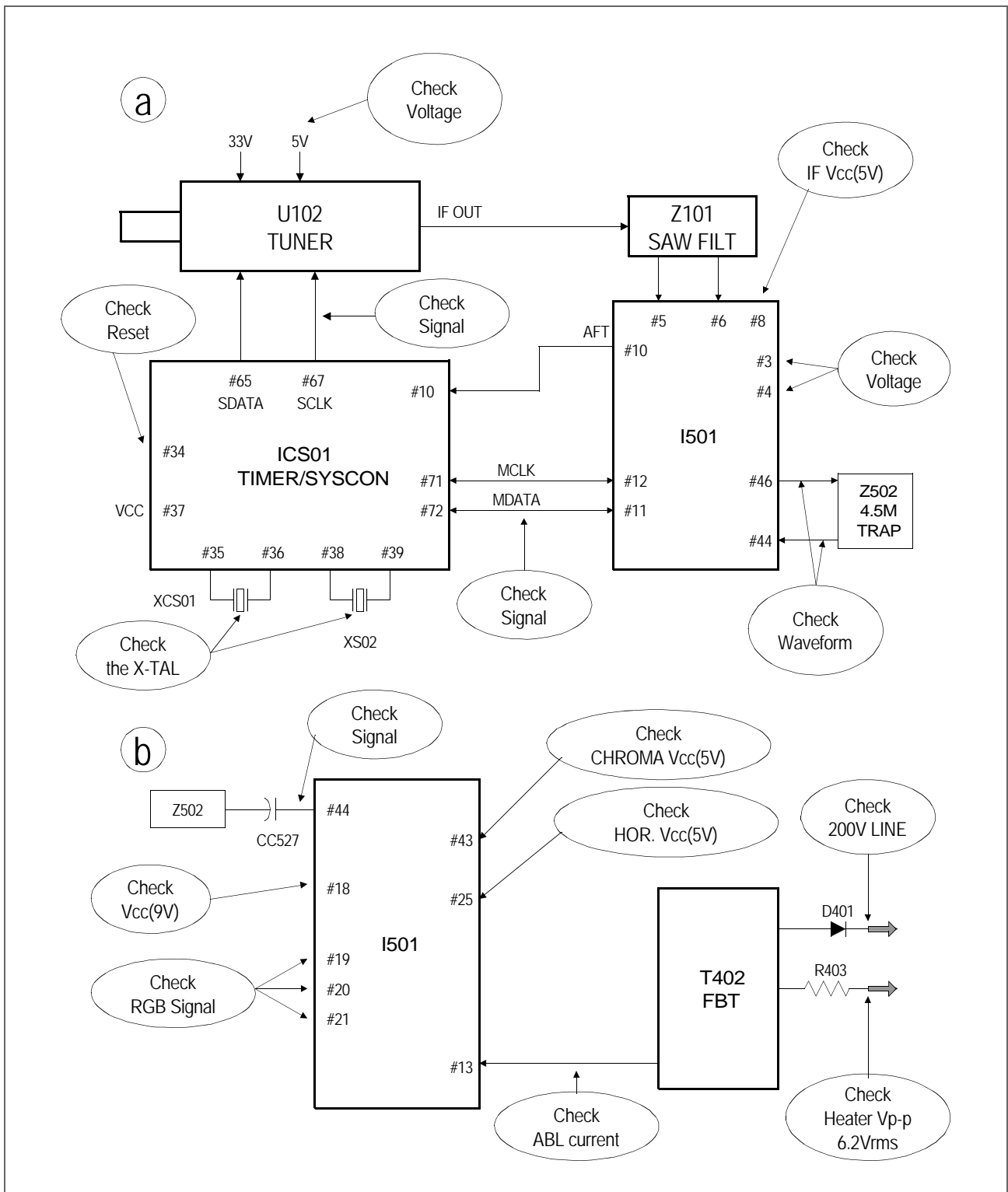


| PIN NO | DESCRIPTION | PIN NO | DESCRIPTION |
|--------|-------------|--------|---------------|
| 1 | GATE DRIVE1 | 10 | +12V INPUT |
| 2 | OCP | 11 | POWER CONTROL |
| 3 | SOURCE | 12 | +26 OUTPUT |
| 4 | GND1 | 13 | GND2 |
| 5 | GATE | 14 | +133V INPUT |
| 6 | GATE DRIVE2 | | |

2. TV PART

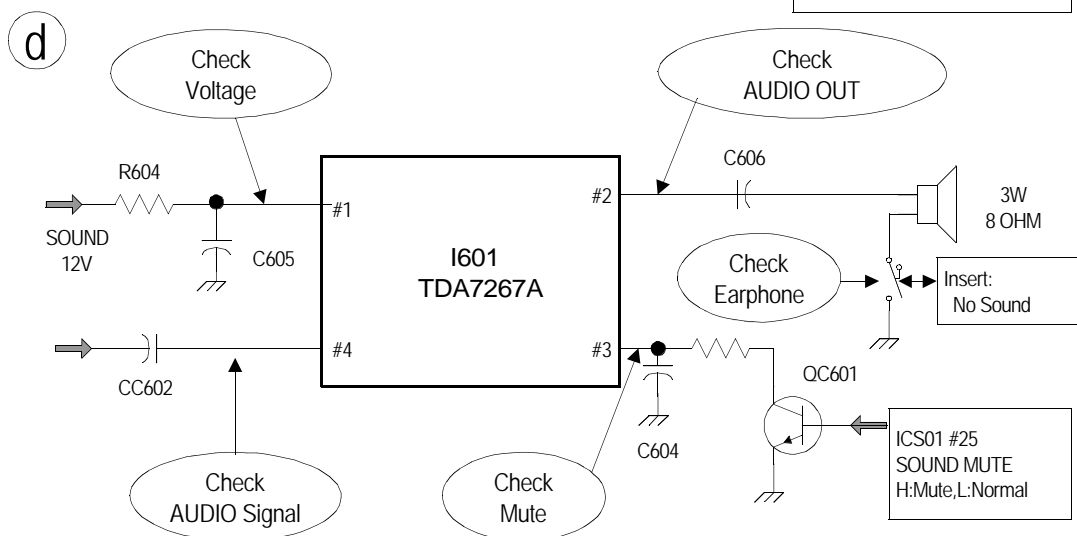
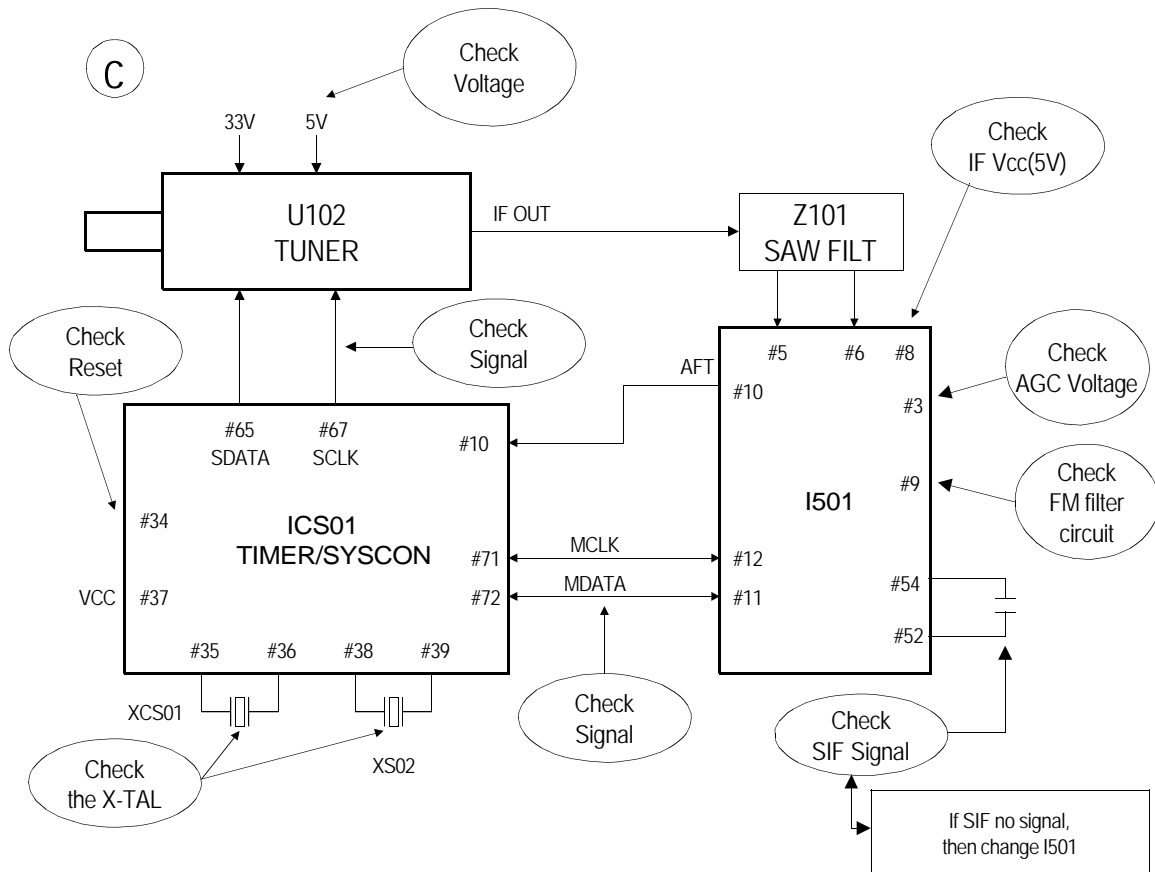
2-1) NO PICTURE

| | |
|--------------------------------|-------------------------|
| Check the waveform of I501 #46 | NG : GO to the figure ㉓ |
| | OK : GO to the figure ㉔ |



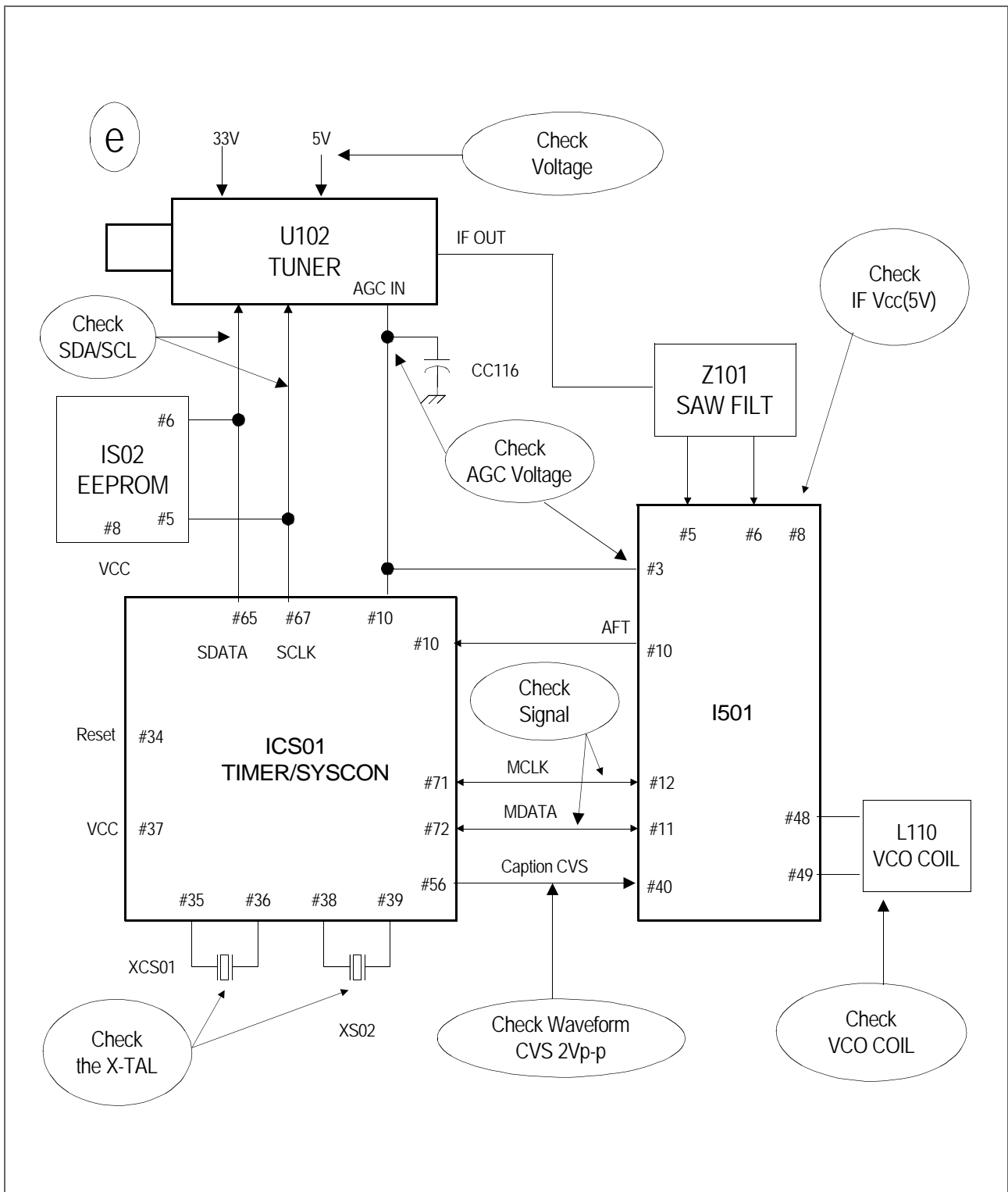
2-2) NO SOUND

| | |
|-------------------------------|-------------------------|
| Check the waveform of I501 #1 | NG : GO to the figure ㉓ |
| | OK : GO to the figure ㉔ |

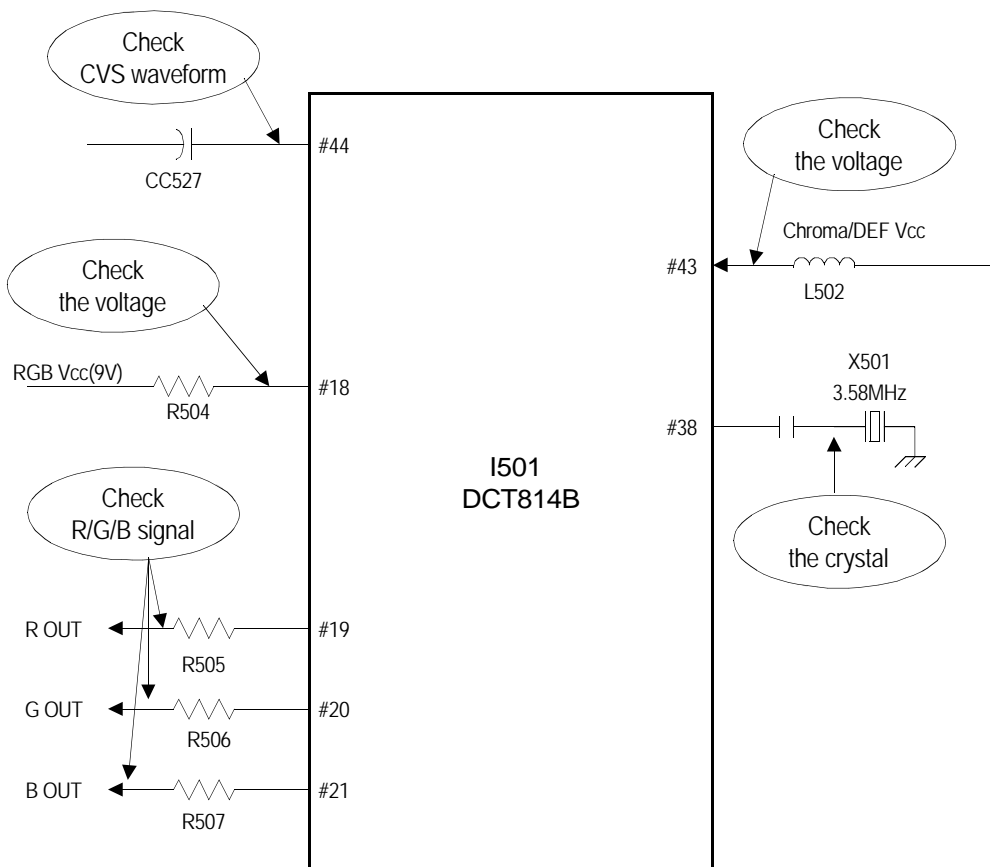


2-3) CHANNEL DON'T STOP

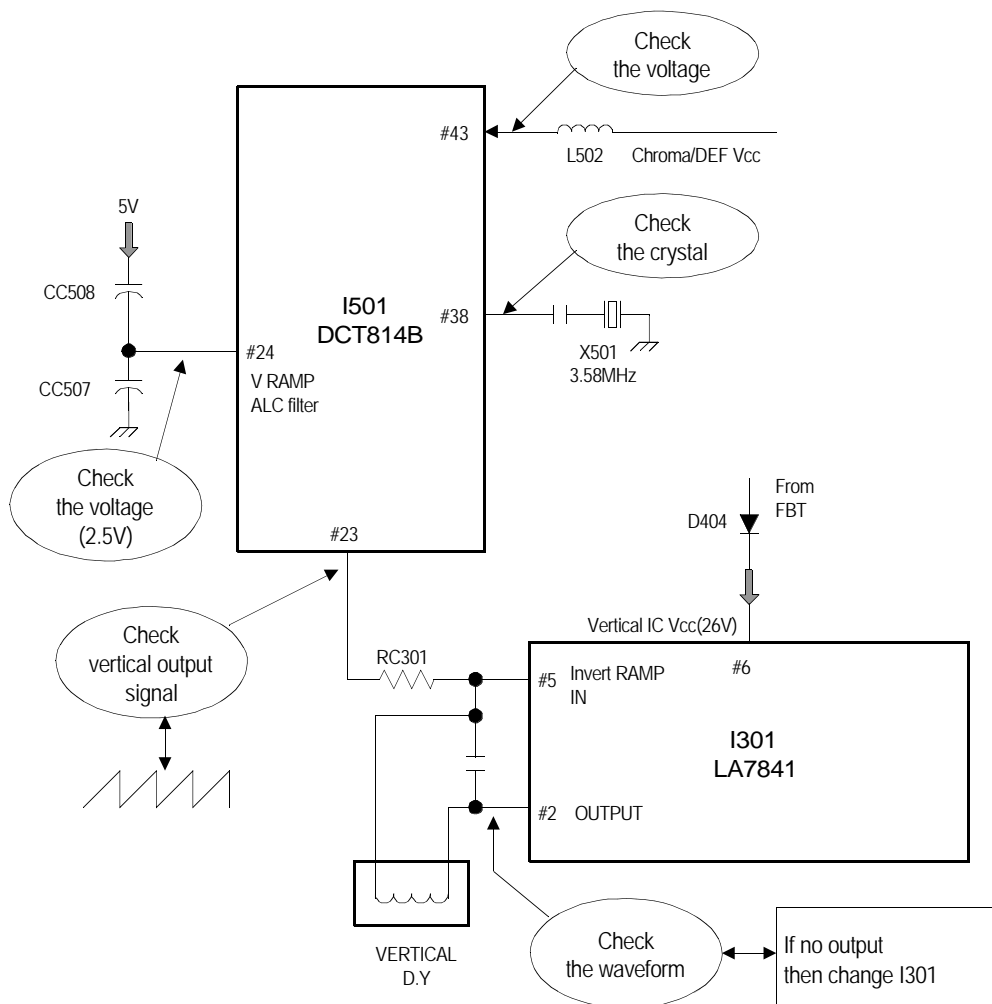
| | |
|------------------------------------|------------------------------------|
| Check the input signal conditions. | NG : Loss of signal or weak signal |
| | OK : GO to the figure ㉔ |



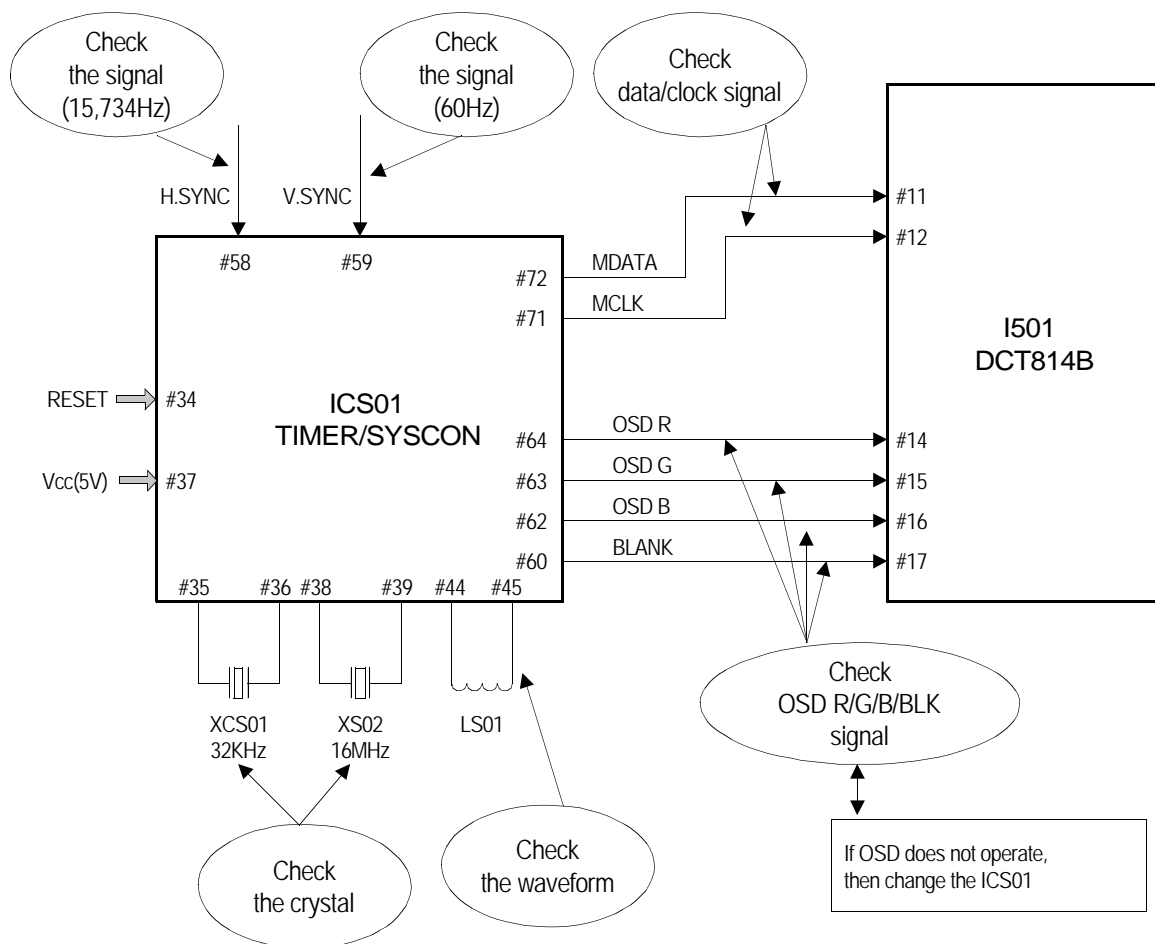
2-4) NO COLOR



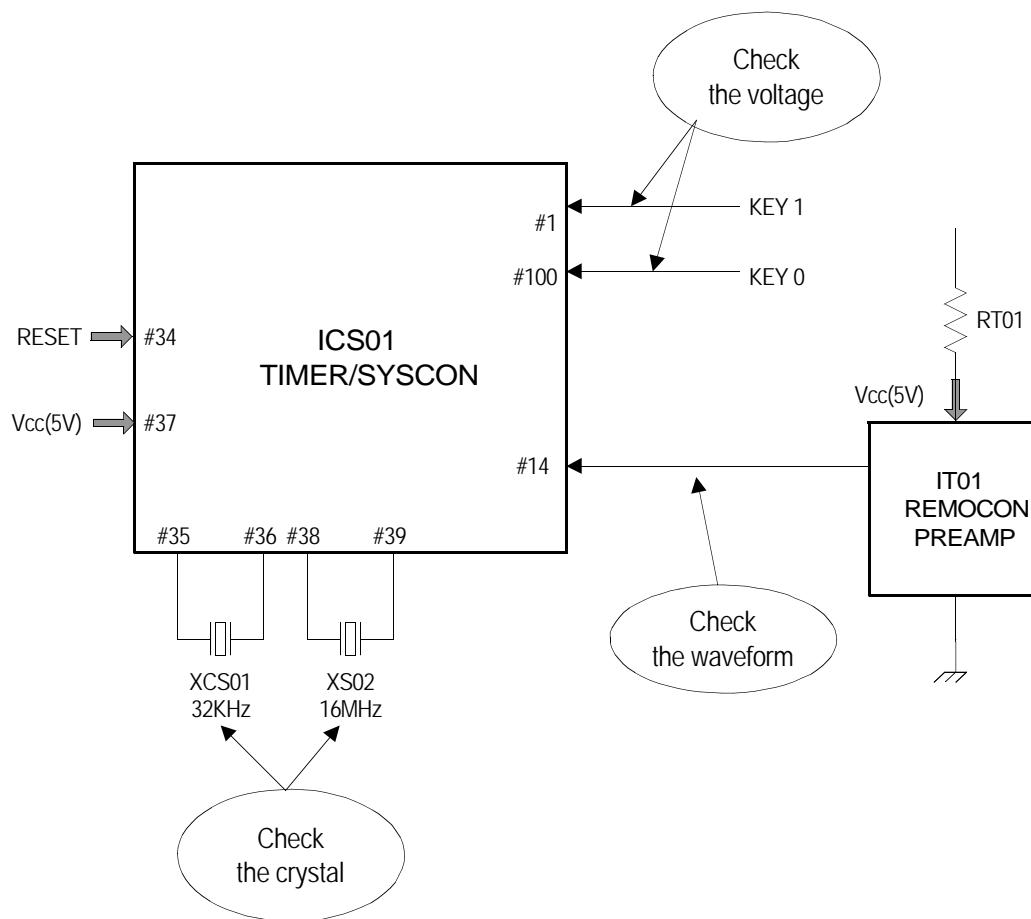
2-5) NO VERTICAL DEFLECTION



2-6) NO ON-SCREEN DISPLAY



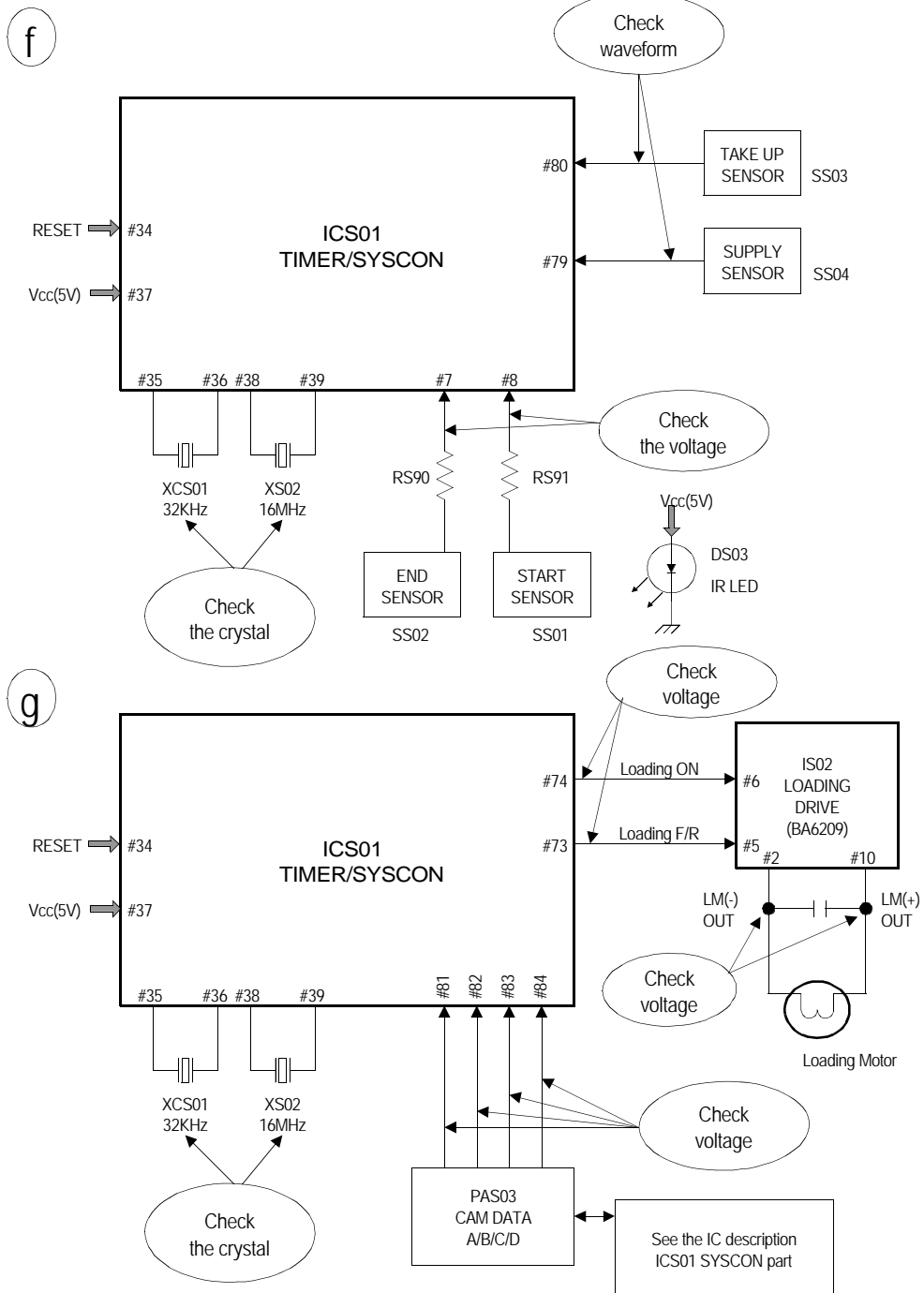
2-7) REMOTE CONTROL DOES NOT OPERATE



3. VCR PART

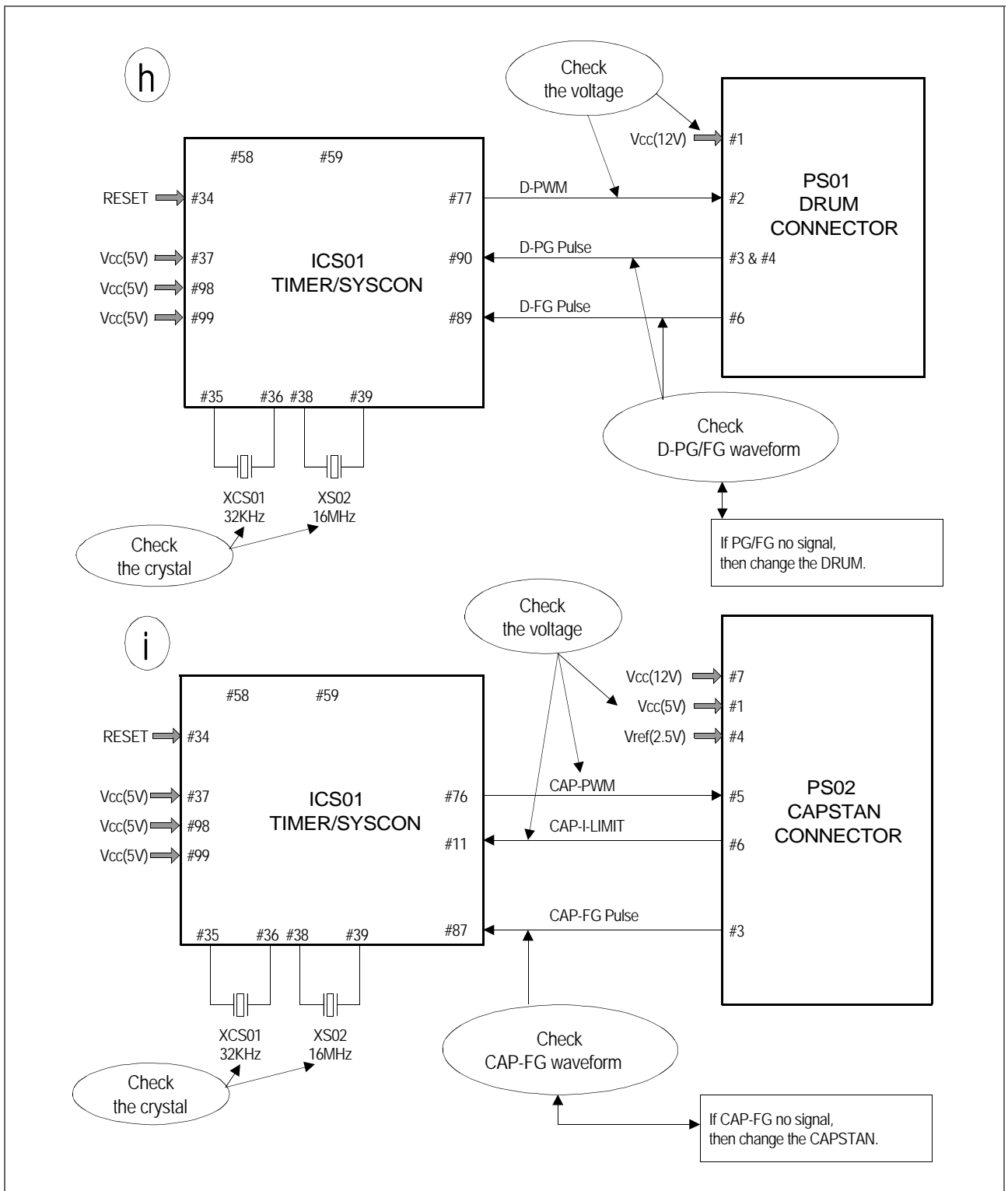
3-1) NO LOADING

| | |
|---|--------------------------------|
| Check the loading conditions (VHS TAPE) | EJECT : GO to the figure ㉑ |
| | UNLOADING : GO to the figure ㉒ |



3-2) NO ROTATING

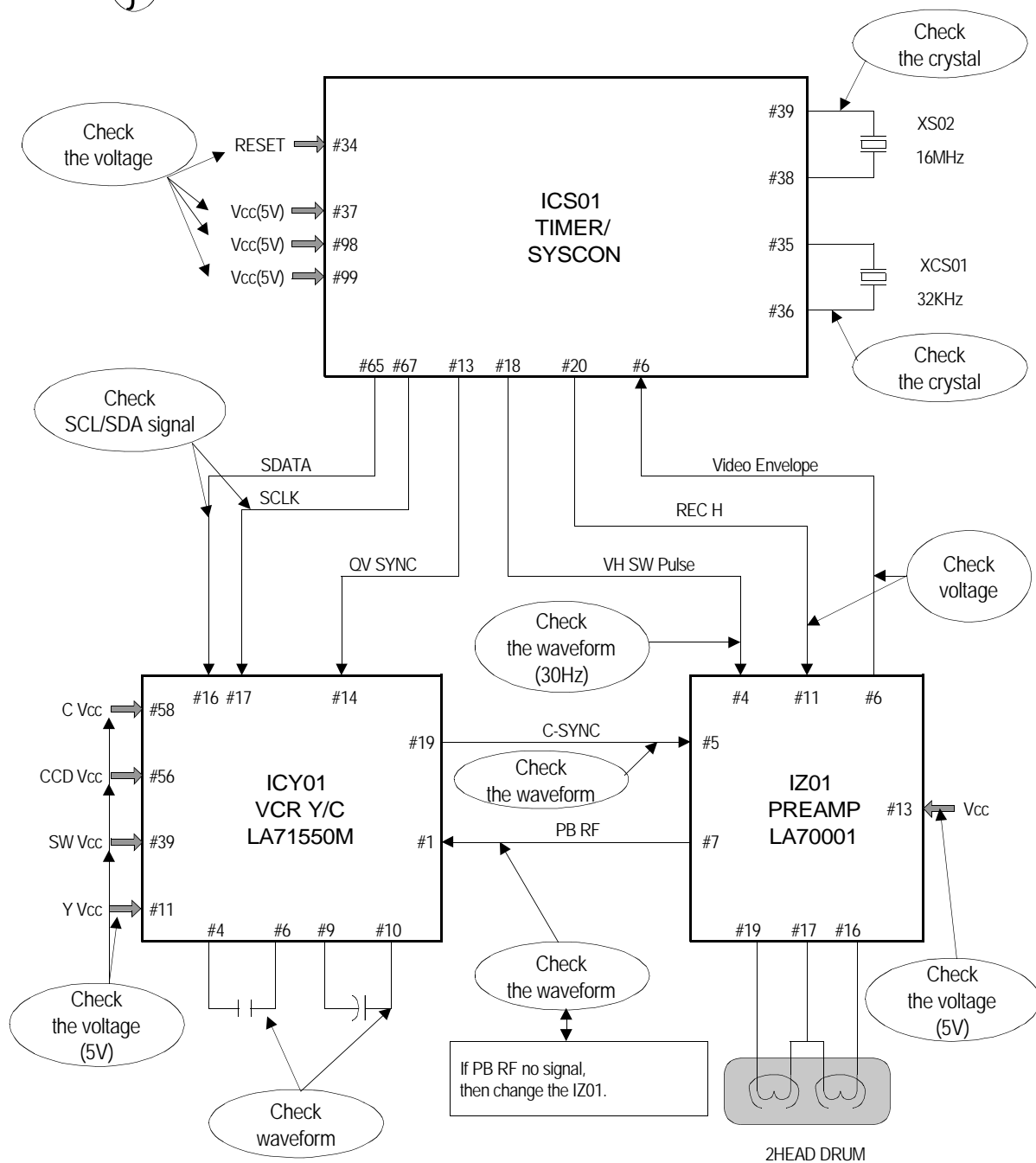
| | |
|--------------------|------------------------------|
| Check the Rotating | DRUM : GO to the figure ㉠ |
| | CAPSTAN : GO to the figure ㉡ |

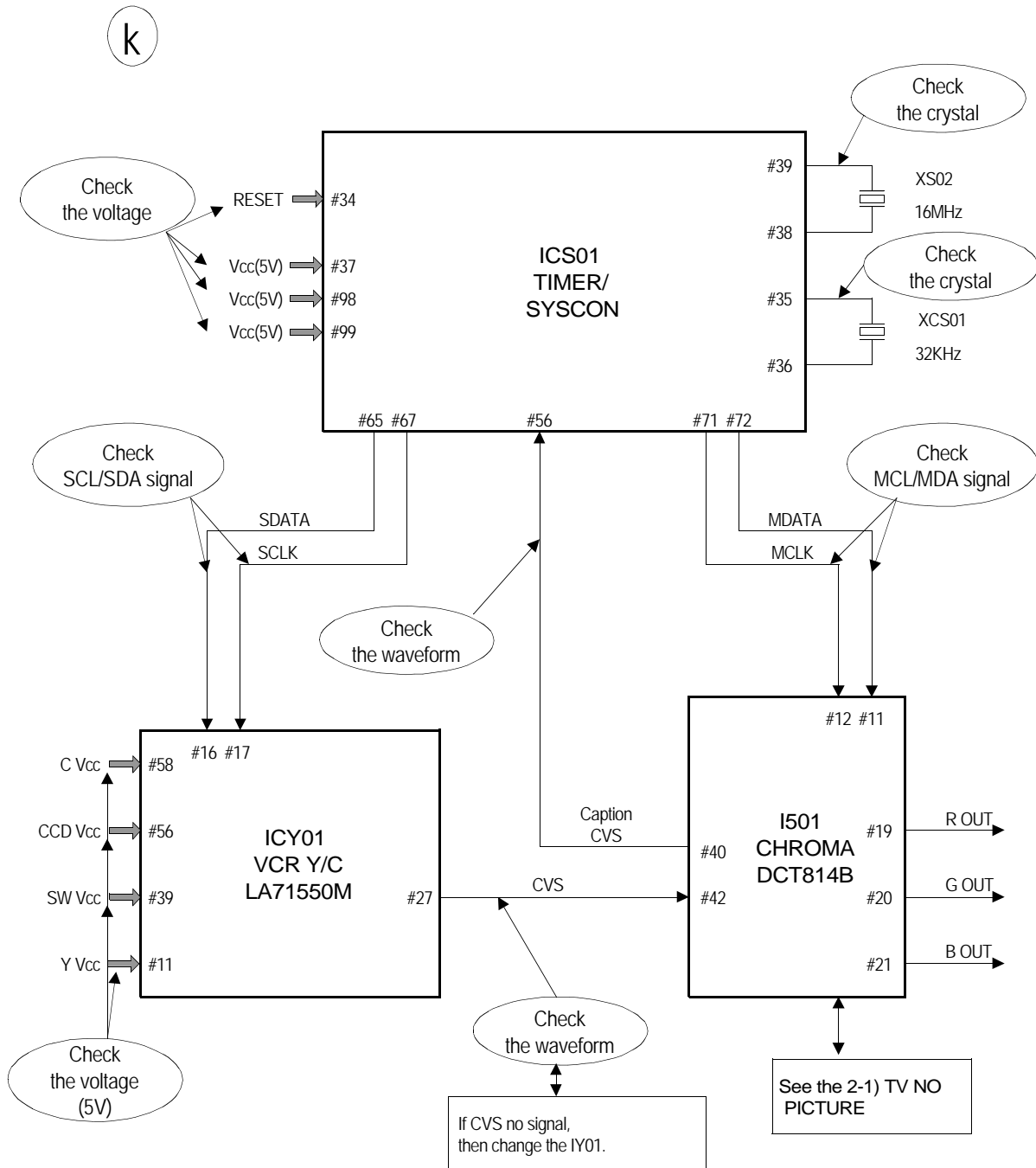


3-3) NO PICTURE PLAYBACK

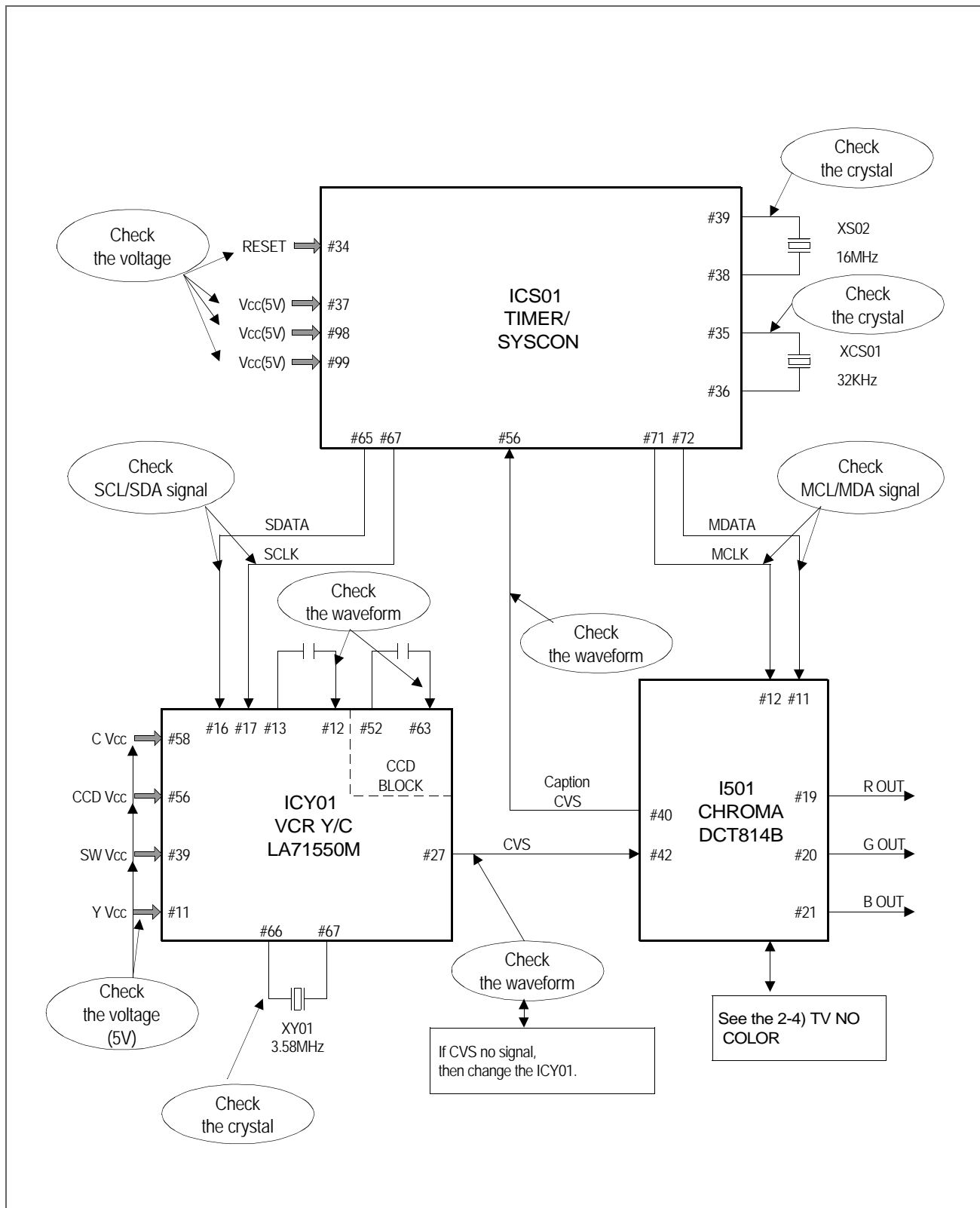
| | |
|---------------------------------|-------------------------|
| Check the waveform of ICY01 #27 | NG : GO to the figure ① |
| | OK : GO to the figure ② |

j

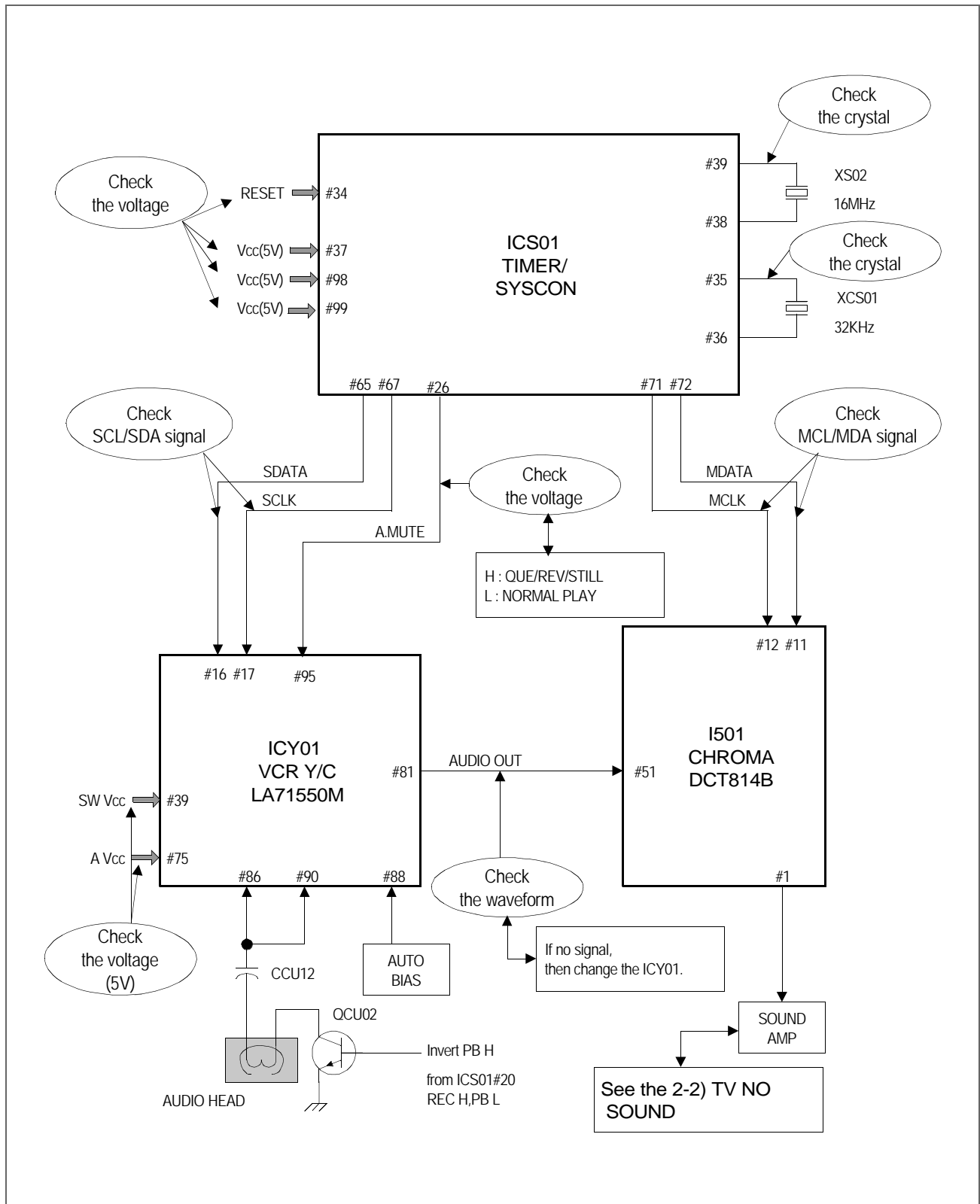




3-4) NO COLOR PLAYBACK

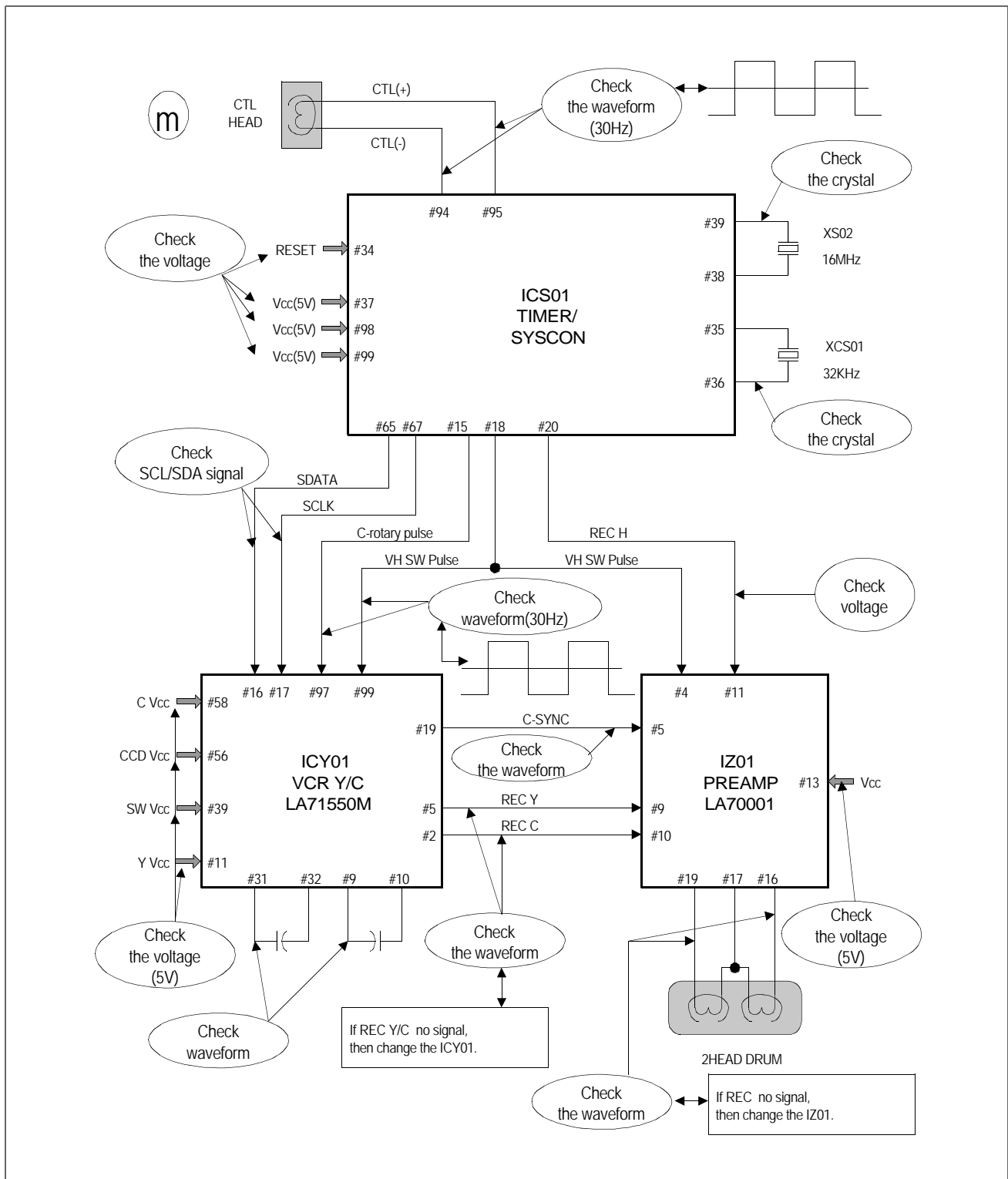


3-5) NO SOUND PLAYBACK



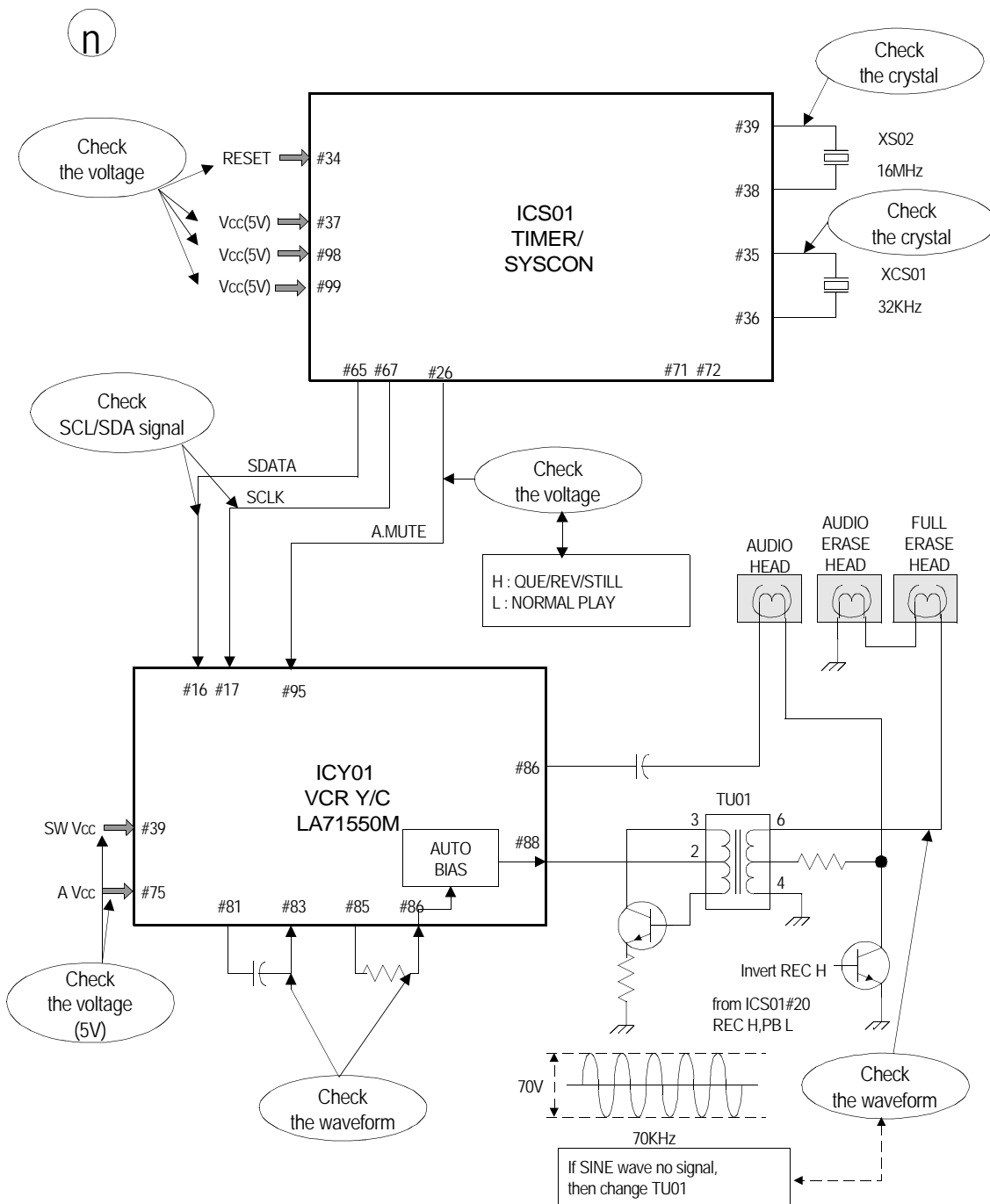
3-6) NO RECORD PICTURE

| | |
|---------------------------------|-------------------------------------|
| Check the waveform of ICY01 #40 | NG : GO to the figure ②-1 (TV PART) |
| | OK : GO to the figure ㉓ |

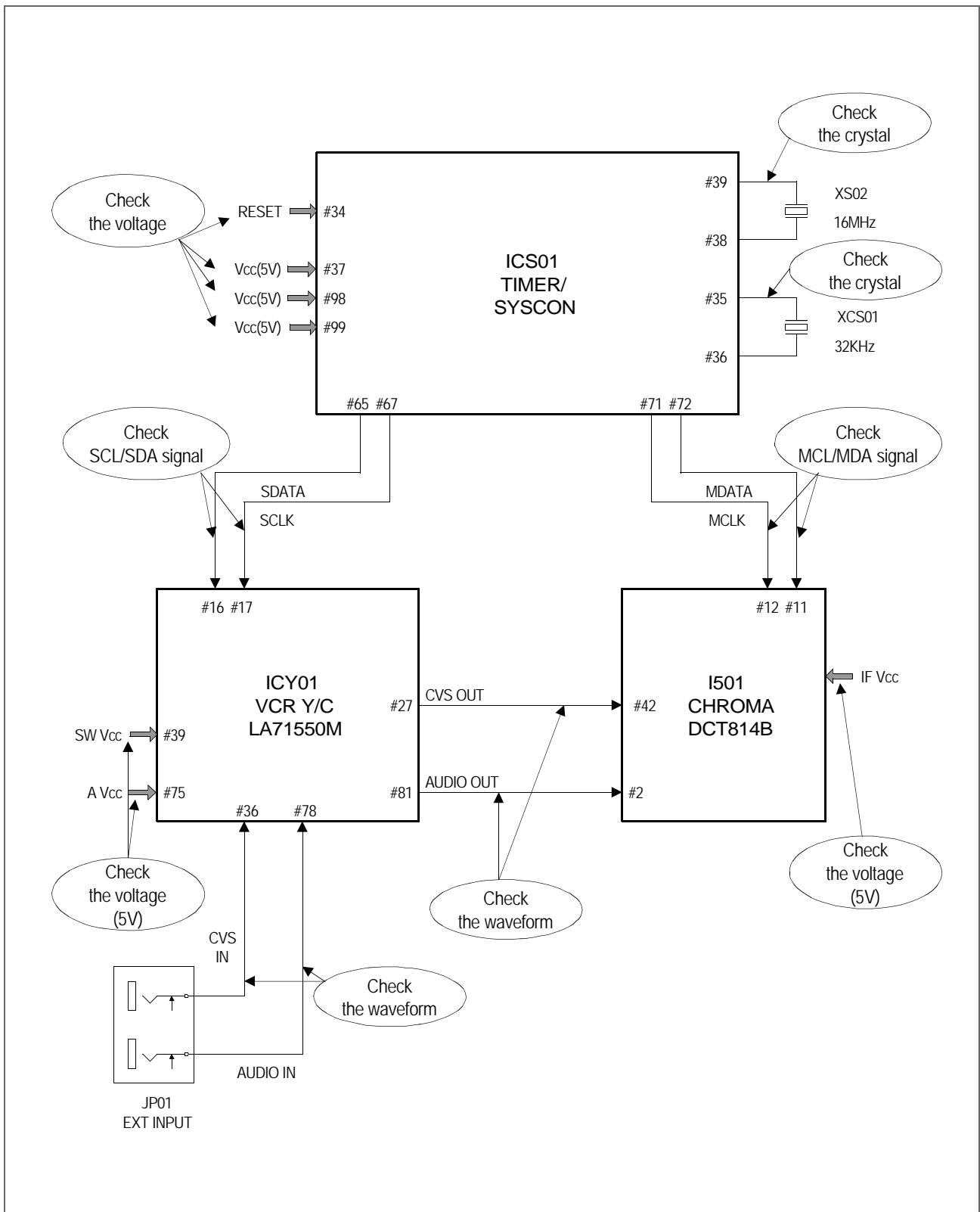


3-7) NO RECORD SOUND

| | |
|---------------------------------|------------------------------------|
| Check the waveform of ICY01 #74 | NG : GO to the figure ②-2(TV PART) |
| | OK : GO to the figure ㉒ |



3-8) NO EXTERNAL VIDEO / AUDIO



ELECTRICAL PARTS LIST

CAUTION

“△” is safety component, so it must be used the same component.

□ DVQ-19H1FC

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|---------|------------|---------------------|-------------------------|-------|------------|--------------------|---------------------------|
| ZZ100 | 48B4139A02 | TRANSMITTER REMOCON | R-39A02 | M201 | 4852070100 | MASK FRONT | FR HIPS BK |
| ZZ110 | PTACPWJ690 | ACCESSORY AS | DVQ-20H1FC | ZZ202 | PTSPPWJ690 | SPEAKER AS | DVQ-20H1FC |
| 20 | 486A716200 | BATTERY | AAAM 1.5V | PA601 | 4850703S50 | CONNECTOR | YH025-03+35098+ULW=200 |
| 40 | 485860710 | MANUAL INSTRUCTION | DVQ-14/20H1FC | SP01 | 4858314310 | SPEAKER | SP-5070A01 3W 8 OHM |
| M821 | 4858213800 | BAG INSTRUCTION | L.D.P.E T0.05X250X400 | SP01A | 4851935501 | SPKR BRKT AS | 3951901+3952500 |
| ZZ120 | PTBCSHJ690 | COVER BACK AS | DVQ-20H1FC | SP01B | 4856013600 | SCREW SPKR FIX | SWRM+SECC |
| M211 | 4852153100 | COVER BACK | FR HIPS BK | ZZ290 | PTMPMSJ690 | PCB MAIN MANUAL AS | DVQ-20H1FC |
| M541 | 4855415800 | SPEC PLATE | 150ART P/E FILM (C/TV) | A001 | 4859812892 | PCB MAIN | 330X246 S1B |
| M781 | 4857817610 | CLOTH BLACK | FELT 300X20X0.7 | C101 | CMXB1H103J | C MYLAR | 50V EU 0.01MF J (TP) |
| M782 | 4857817630 | CLOTH BLACK | FELT 400X20X0.7 | C102 | CMXB1H333J | C MYLAR | 50V EU 0.033MF J (TP) |
| M783 | 4857817621 | CLOTH BLACK | CLOTH T0.7 L=60 | C105 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP |
| ZZ130 | PTPKCPJ690 | PACKING AS | DVQ-20H1FC | C117 | CEXF1H100V | C ELECTRO | 50V RSS 10MF (5X11) TP |
| M801 | 4858038300 | BOX CARTON | DW-3 2086 | C121 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP |
| M801A | 6520010100 | STAPLE PIN | 18MM J D O | C301 | CEXF1H479V | C ELECTRO | 50V RSS 4.7MF (5X11) TP |
| M811 | 4858189500 | PAD | EPS 20H1 | C302 | CEXF1V101V | C ELECTRO | 35V RSS 100MF (8X11.5) TP |
| M822 | 4858215000 | BAG P.E | FOAM LEX 0.5T*1200*1150 | C303 | CXSL2H100D | C CERA | 500V SL 10PF D (TAPPING) |
| △ ZZ131 | 48519A5110 | CRT GROUND NET | 2001S-1015-1P | C304 | CMXB1H103J | C MYLAR | 50V EU 0.01MF J (TP) |
| ZZ132 | 58G0000122 | COIL DEGAUSSING | DC-2030 | C305 | CMXB1H104J | C MYLAR | 50V EU 0.1MF J (TP) |
| △ CRT1 | PTRTPWJ690 | CRT AS | NTSC 20" ITC CRT AS | C308 | CEXF1E102V | C ELECTRO | 25V RSS 1000MF (13X20) TP |
| △ V01 | 58D0000083 | COIL DY | ODY-M2050 | C309 | CMXL1H105J | C MYLAR | 50V MEU 1MF J |
| V02 | 2233030001 | PAINT LOCK | 3B-1401B | C310 | CEXF1H100V | C ELECTRO | 50V RSS 10MF (5X11) TP |
| V03 | 2TC26019BE | TAPE CLOTH | 19X30 BEIGE | C401 | CEYF2D101V | C ELECTRO | 200V RSS 100MF (16X31.5) |
| V04 | 2224050025 | BOND SILICON | RTV 122 TUBE | C402 | CMYH3C622J | C MYLAR | 1.6KV BUP 6200PF J |
| V05 | 4850PM001- | MAGNET CP | NY-225 (MINI NECK) | C403 | CCXB2H102K | C CERA | 500V B 1000PF K (TAPPING) |
| V06 | 48A96R004- | RUBBER WEDGE | HMR 28 SR (J0X54) | C404 | CEXF2E100V | C ELECTRO | 250V RSS 10MF (10X20) TP |
| V901 | 48A96420N1 | CRT BARE | A48JLL40X(W) | C405 | CEXF1H100V | C ELECTRO | 50V RSS 10MF (5X11) TP |
| M193 | 4851936800 | BUTTON CTRL | 4942001+5538301 | C406 | CCXB2H102K | C CERA | 500V B 1000PF K (TAPPING) |
| M193A | 7128301212 | SCREW TAPPING | T2S WAS 3X12 MFZN BK | C407 | CEXF1C222V | C ELECTRO | 16V RSS 2200MF (13X25) TP |
| M201A | 4856013300 | SCREW CRT FIXING | 30X80 BK | C408 | CCXB2H102K | C CERA | 500V B 1000PF K (TAPPING) |
| M201B | 4856013302 | SCREW CRT FIXING | 30X190 BK | C409 | CMXM2A104J | C MYLAR | 100V 0.1MF J (TP) |
| M201C | 4856215402 | WASHER RUBBER | CR T2.0 | C410 | CEXF1V471C | C ELECTRO | 35V RUS 470MF (10X20) TP |
| M211A | 7122401611 | SCREW TAPPING | T2S TRS 4X16 MFZN | C411 | CEXF1C100A | C ELECTRO | 16V RSM 10MF 5X7 |
| M281 | 4852817720 | DOOR F/L | ABS BK SILK | C412 | CCYB2H103K | C CERA | 500V B 0.01MF K |
| M481 | 4854854701 | BUTTON POWER | ABS BK | C413 | CCXB2H102K | C CERA | 500V B 1000PF K (TAPPING) |
| M671 | 4856723400 | SPRING | SWPB 0.4 | C415 | CEXF2C109V | C ELECTRO | 160V RSS 1MF (6.3X11) TP |
| M672 | 4856715600 | SPRING | SWPA PIE 0.4 | C416 | CMYF2D624J | C MYLAR | 200V MPP 0.62MF J |
| M681 | 97P4602700 | CLAMP CORD | NYLON 66 BLK 5280N | C505 | CEXF1C470A | C ELECTRO | 16V RSM 47MF (5X7) TP |
| ZZ200 | PTFMSJJ690 | MASK FRONT AS | DVQ-20H1FC | C509 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP |



ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|--------|------------|---------------|---------------------------|-------|------------|---------------|------------------------|
| C512 | CMXB1H333J | C MYLAR | 50V EU 0.033MF J (TP) | CC118 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| C518 | CMXB1H473J | C MYLAR | 50V 0.047MF J (TP) | CC119 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| C525 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP | CC120 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| C604 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP | CC122 | HCTAJ228MB | C CHIP TANTAL | 35V 0.22MF M 3216 |
| C605 | CEXF1E331V | C ELECTRO | 25V RSS 330MF (10X12.5)TP | CC123 | HCBK102KCA | C CHIP CERA | 50V X7R 1000PF K 2012 |
| C606 | CEXF1E471V | C ELECTRO | 25V RSS 470MF (10X16) TP | CC130 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 |
| ⚠ C801 | CL1JB3474K | C LINE ACROSS | AC250V 0.47MF U/C/SNDF/SV | CC131 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 |
| ⚠ C802 | CCXB2H222K | C CERA | 500V B 2200PF K (TAPPING) | CC501 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| ⚠ C803 | CCXB2H222K | C CERA | 500V B 2200PF K (TAPPING) | CC502 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| C804 | CEYN2E221P | C ELECTRO | 250V LHS 220MF (22X30) | CC503 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| C805 | CMYU3A472J | C MYLAR | 1KV BCP 4700PF J | CC506 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| C820 | CCXB3D471K | C CERA | 2KV B 470PF K (TAPPING) | CC507 | HCTAJ228MB | C CHIP TANTAL | 35V 0.22MF M 3216 |
| C821 | CEYF2D101V | C ELECTRO | 200V RSS 100MF (16X31.5) | CC508 | HCTAJ228MB | C CHIP TANTAL | 35V 0.22MF M 3216 |
| C822 | CEXF2A100V | C ELECTRO | 100V RSS 10MF (6.3X11) TP | CC510 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| C823 | CEXF1C102C | C ELECTRO | 16V RUS 1000MF (10X20) TP | CC511 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| C824 | CEXE1E102E | C ELECTRO | 25V RM 1000MF (10X20) TP | CC513 | HCQK181JCA | C CHIP CERA | 50V CH 180PF J 2012 |
| C825 | CEXF1C101V | C ELECTRO | 16V RSS 100MF (6.3X11) TP | CC516 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| C826 | CEXF1H479V | C ELECTRO | 50V RSS 4.7MF (5X11) TP | CC517 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| C827 | CEXF1C331V | C ELECTRO | 16V RSS 330MF (8X11.5) TP | CC519 | HCTAJ478MB | C CHIP TANTAL | 35V 0.47MF M 3216 |
| C828 | CEXE1A222E | C ELECTRO | 10V RM 2200MF (10X20) TP | CC521 | HCQK180JCA | C CHIP CERA | 50V CH 18PF J 2012 |
| C829 | CEXF1C222V | C ELECTRO | 16V RSS 2200MF (13X25) TP | CC522 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| C830 | CEXF1C102C | C ELECTRO | 16V RUS 1000MF (10X20) TP | CC524 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| C831 | CCXB3A471K | C CERA | 1KV B 470PF K (T) | CC526 | HCTAF229MB | C CHIP TANTAL | 16V 2.2MF M 3216 |
| C832 | CCXB3A471K | C CERA | 1KV B 470PF K (T) | CC527 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| C833 | CCXB3A471K | C CERA | 1KV B 470PF K (T) | CC528 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| C834 | CMXB1H104J | C MYLAR | 50V EU 0.1MF J (TP) | CC529 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| C835 | CEXF1C470A | C ELECTRO | 16V RSM 47MF (5X7) TP | CC532 | HCBK102KCA | C CHIP CERA | 50V X7R 1000PF K 2012 |
| ⚠ C888 | CH1BFE472M | C CERA AC | AC400V 4700PF M U/C/V | CC551 | HCQK221JCA | C CHIP CERA | 50V CH 220PF J 2012 |
| C901 | CMXL2E104K | C MYLAR | 250V MEU 0.1MF K | CC553 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 |
| C902 | CMXL1J224J | C MYLAR | 63V MEU 0.22MF J (TP) | CC601 | HCBK153KCA | C CHIP CERA | 50V X7R 0.015MF K 2012 |
| C965 | CCYB3D102K | C CERA | 2KV B 1000PF K | CC602 | HCTAJ108MB | C CHIP TANTAL | 35V 0.1MF M 3216 |
| CC103 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CC603 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC104 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CC836 | HCTAD479MB | C CHIP TANTAL | 10V 4.7MF M 3216 |
| CC106 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | CCS01 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC107 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCS02 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC108 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 | CCS03 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC109 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 | CCS04 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CC110 | HCTAJ478MB | C CHIP TANTAL | 35V 0.47MF M 3216 | CCS05 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC111 | HCTAJ108MB | C CHIP TANTAL | 35V 0.1MF M 3216 | CCS06 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC112 | HCTAF229MB | C CHIP TANTAL | 16V 2.2MF M 3216 | CCS07 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC113 | HCQK809DCA | C CHIP CERA | 50V CH 8PF D 2012 | CCS08 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC114 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCS09 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC115 | HCBK152KCA | C CHIP CERA | 50V X7R 1500PF K 2012 | CCS10 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CC116 | HCTAF229MB | C CHIP TANTAL | 16V 2.2MF M 3216 | CCS11 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|-------|------------|---------------|------------------------|-------|------------|---------------|------------------------|
| CCS12 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCU04 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS13 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCU05 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS14 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | CCU06 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 |
| CCS16 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCU07 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS18 | HCQK180JCA | C CHIP CERA | 50V CH 18PF J 2012 | CCU09 | HCBK153KCA | C CHIP CERA | 50V X7R 0.015MF K 2012 |
| CCS19 | HCQK180JCA | C CHIP CERA | 50V CH 18PF J 2012 | CCU10 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS20 | HCQK240JCA | C CHIP CERA | 50V CH 24PF J 2012 | CCU11 | HCQK821JCA | C CHIP CERA | 50V CH 820PF J 2012 |
| CCS21 | HCQK240JCA | C CHIP CERA | 50V CH 24PF J 2012 | CCU12 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS24 | HCQK240JCA | C CHIP CERA | 50V CH 24PF J 2012 | CCU13 | HCBK152KCA | C CHIP CERA | 50V X7R 1500PF K 2012 |
| CCS25 | HCQK240JCA | C CHIP CERA | 50V CH 24PF J 2012 | CCU19 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS27 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCU20 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS29 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCU21 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS30 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | CCU22 | HCBK153KCA | C CHIP CERA | 50V X7R 0.015MF K 2012 |
| CCS31 | HCBK102KCA | C CHIP CERA | 50V X7R 1000PF K 2012 | CCU24 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS32 | HCQK201JCA | C CHIP CERA | 50V CH 200PF J 2012 | CCU25 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS34 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 | CCU26 | HCBK223KCA | C CHIP CERA | 50V X7R 0.022MF K 2012 |
| CCS35 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 | CCY01 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS36 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 | CCY02 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS37 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 | CCY03 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| CCS38 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY04 | HCQK270JCA | C CHIP CERA | 50V CH 27PF J 2012 |
| CCS40 | HCBK223KCA | C CHIP CERA | 50V X7R 0.022MF K 2012 | CCY05 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS41 | HCBK223KCA | C CHIP CERA | 50V X7R 0.022MF K 2012 | CCY06 | HCBK473KCA | C CHIP CERA | 50V X7R 0.047MF K 2012 |
| CCS42 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | CCY07 | HCQK390JCA | C CHIP CERA | 50V CH 39PF J 2012 |
| CCS43 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY08 | HCQK201JCA | C CHIP CERA | 50V CH 200PF J 2012 |
| CCS44 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY09 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| CCS45 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY10 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 |
| CCS46 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY11 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS47 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY12 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS48 | HCBK102KCA | C CHIP CERA | 50V X7R 1000PF K 2012 | CCY13 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS49 | HCBK102KCA | C CHIP CERA | 50V X7R 1000PF K 2012 | CCY14 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 |
| CCS50 | HCBK102KCA | C CHIP CERA | 50V X7R 1000PF K 2012 | CCY15 | HCQK101JCA | C CHIP CERA | 50V CH 100PF J 2012 |
| CCS51 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 | CCY16 | HCQK391JCA | C CHIP CERA | 50V CH 390PF J 2012 |
| CCS52 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 | CCY17 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 |
| CCS53 | HCQK391JCA | C CHIP CERA | 50V CH 390PF J 2012 | CCY18 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS54 | HCQK391JCA | C CHIP CERA | 50V CH 390PF J 2012 | CCY19 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| CCS57 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 | CCY20 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS59 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 | CCY21 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS60 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY22 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 |
| CCS61 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY23 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 |
| CCS63 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY24 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCS64 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY25 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 |
| CCS70 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | CCY26 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |
| CCU01 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 | CCY27 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |
| CCU02 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CCY28 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|-------|------------|---------------|---------------------------|--|------------|-----------------|--------------------------|
| CCY29 | HCTAD100MB | C CHIP TANTAL | 10V 10MF M 3216 | CU15 | CEXF1C470V | C ELECTRO | 16V RSS 47MF (5X11) TP |
| CCY30 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | CU16 | CMXM2A333J | C MYLAR | 100V 0.033MF J (TP) |
| CCY31 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 | CU17 | CMXM2A103J | C MYLAR | 100V 0.01MF J (TP) |
| CCY32 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CU18 | CMXM2A223J | C MYLAR | 100V 0.022MF J TP |
| CCY33 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CY37 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP |
| CCY34 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | CZ06 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP |
| CCY35 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D101 | DUZ33B---- | DIODE ZENER | UZ-33B |
| CCY36 | HCTBC470MB | C CHIP TANTAL | 6.3V 47MF M 3528 | D301 | D1N4003--- | DIODE | 1N4003 (TAPPING) |
| CCY38 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D302 | DUZ33B---- | DIODE ZENER | UZ-33B |
| CCY39 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D303 | DUZ33B---- | DIODE ZENER | UZ-33B |
| CCY40 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | D401 | D1N4937G-- | DIODE | 1N4937G |
| CCY41 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D402 | D1N4937G-- | DIODE | 1N4937G |
| CCY42 | HCBK223KCA | C CHIP CERA | 50V X7R 0.022MF K 2012 | D403 | D1N4937G-- | DIODE | 1N4937G |
| CCY43 | HCTAF339MB | C CHIP TANTAL | 16V 3.3MF M 3216 | D404 | D1N4937G-- | DIODE | 1N4937G |
| CCY44 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 | D406 | D1N4937G-- | DIODE | 1N4937G |
| CCY45 | HCBK473KCA | C CHIP CERA | 50V X7R 0.047MF K 2012 | D501 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CCY46 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | D504 | DUZ9R1BM-- | DIODE ZENER | UZ-9.1BM 9.1V |
| CCY47 | HCBK473KCA | C CHIP CERA | 50V X7R 0.047MF K 2012 | D551 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CCY48 | HCBK472KCA | C CHIP CERA | 50V X7R 4700PF K 2012 | D552 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CCY49 | HCQK330JCA | C CHIP CERA | 50V CH 33PF J 2012 | D553 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CCY50 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 |  D801 | DPBS208GUF | DIODE BRIDGE | PBS208GU-CA (FORMING) |
| CCY51 | HCQK509DCA | C CHIP CERA | 50V CH 5PF D 2012 | D820 | DRGP30J--- | DIODE | RGP30J |
| CCY52 | HCQK100DCA | C CHIP CERA | 50V CH 10PF D 2012 | D821 | D1N4937G-- | DIODE | 1N4937G |
| CCY53 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D822 | DD2S4M---- | DIODE | D2S4M |
| CCY54 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D823 | DD2S4M---- | DIODE | D2S4M |
| CCZ02 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 | D824 | DUZ9R1BM-- | DIODE ZENER | UZ-9.1BM 9.1V |
| CCZ03 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D825 | DRZ1175V1- | DIODE | RZ1175V1 |
| CCZ04 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D826 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CCZ05 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D827 | DUZ15BM-- | DIODE ZENER | UZ-15BM |
| CCZ07 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | D828 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CCZ08 | HCTAF109MB | C CHIP TANTAL | 16V 1MF M 3216 | D829 | D1N4003--- | DIODE | 1N4003 (TAPPING) |
| CCZ09 | HCFK104ZCA | C CHIP CERA | 50V Y5V 0.1MF Z 2012 | DS01 | D1N4003--- | DIODE | 1N4003 (TAPPING) |
| CCZ10 | HCBK103KCA | C CHIP CERA | 50V X7R 0.01MF K 2012 | DS02 | D1N4003--- | DIODE | 1N4003 (TAPPING) |
| CS15 | CDYE0H104A | C SUPER | 5.5V 0.1F DA | DS03 | DS15312H-- | LED IR | SI5312-H |
| CS17 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP | DS03A | 97P2339600 | HOLDER IR | ABS |
| CS28 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP | DS04 | DUZ6R2BM-- | DIODE ZENER | UZ-6.2BM 6.2V |
| CS33 | CMXL1J224J | C MYLAR | 63V MEU 0.22MF J (TP) | DS05 | DUZ5R1BM-- | DIODE ZENER | UZ-5.1BM |
| CS39 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP | DS07 | D1N4148--- | DIODE | 1N4148 (TAPPING) |
| CS62 | CEXF1E331V | C ELECTRO | 25V RSS 330MF (10X12.5)TP | DT01 | DKLR114L-- | LED | KLR114L |
| CS65 | CEXF1E101V | C ELECTRO | 25V RSS 100MF (6.3X11) TP | DT02 | DSR54MVW3- | LED | SPR54 MVW RED/GREEN |
| CS66 | CEXF1E331V | C ELECTRO | 25V RSS 330MF (10X12.5)TP | DT03 | DUZ5R6BM-- | DIODE ZENER | UZ-5.6BM(TAPPING) |
| CT01 | CEXF1C470V | C ELECTRO | 16V RSS 47MF (5X11) TP | DT04 | DUZ5R6BM-- | DIODE ZENER | UZ-5.6BM(TAPPING) |
| CU03 | CEXF1C101A | C ELECTRO | 16V RSM 100MF (6.3X7) TP |  F801 | 5F1GB4021L | FUSE GLASS TUBE | UL/CSA TL 4A 125V MF51 |
| CU14 | CEXF1C470V | C ELECTRO | 16V RSS 47MF (5X11) TP | F801A | 4857415001 | CLIP FUSE | PFC5000-0702 |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|-----------|------------|----------------------|---------------------------|-----------|------------|-----------------|-------------------------|
| F801B | 4857415001 | CLIP FUSE | PFC5000-0702 | JC16-JC17 | HRF8000-EA | R CHIP | 1/8 0 OHM 3216 |
| I301 | 1LA7841--- | IC VERTICAL | LA7841 | JC19-JC21 | HRF8000-EA | R CHIP | 1/8 0 OHM 3216 |
| I301 | PTB2SW7100 | HEAT SINK ASS'Y | 1LA7841--- + 7174300811 | JP01 | 4859109950 | JACK PIN BOARD | PH-JB-9710A |
| I301A | 4857027100 | HEAT SINK | SPCC T1.0+SN | L101 | 5CPX560J-- | COIL PEAKING | 56UH J (RADIAL) |
| I301B | 7174300811 | SCREW TAPPTITE | TT2 RND 3X8 MFZN | L102 | 58C5580019 | COIL CHOKE | TRF-9225 (0.55UH) |
| I501 | 1DCT814B-- | IC CHROMA | DCT814B | L103 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| I601 | 1TDA7267A- | IC AMP | TDA7267A | L110 | 58N0000042 | COIL VCO | TRF-V008 |
| ⚠ I801 | 4850M04310 | MODULE POWER | DPM001T1 | L401 | 58C0000026 | COIL BEAD | HC-4035 |
| I803 | PTX2SW6900 | HEAT SINK ASS'Y | 1K1A7805P1 + 7174301011 | L501 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| I803 | 1K1A7805P1 | IC REGULATOR | KIA7805PI | L502 | 5CPZ470K04 | COIL PEAKING | 47UH 10.5MM K (LAL04TB) |
| I803A | 4857026900 | HEAT SINK | AL EX | L503 | 5CPZ150K02 | COIL PEAKING | 15UH K (AXIAL 3.5MM) |
| I803B | 7174301011 | SCREW TAPPTITE | TT2 RND 3X10 MFZN | ⚠ L801 | 5PLF24A1-- | FILTER LINE | LF-24A1 |
| I804 | PTB2SW4617 | HEAT SINK ASS'Y | 1PQ05RF11/12 + 7174300811 | L802 | 5MC0000100 | COIL BEAD | HC-3550 |
| I804 | 1PQ05RF11- | IC REGULATOR | PQ05RF11 | L803 | 5MC0000100 | COIL BEAD | HC-3550 |
| I804A | 4857024617 | HEAT SINK | AL EX | L804 | 58Q0000093 | COIL DELAY LINE | RS208 |
| I804B | 7174300811 | SCREW TAPPTITE | TT2 RND 3X8 MFZN | L820 | 5MC0000100 | COIL BEAD | HC-3550 |
| I805 | 1PQ12RF11- | IC REGULATOR | PQ12RF11 | L821 | 5MC0000100 | COIL BEAD | HC-3550 |
| I805A | 7174300811 | SCREW TAPPTITE | TT2 RND 3X8 MFZN | L823 | 58CX430599 | COIL CHOKE | AZ-9004Y 940K TP |
| I901 | PTG1SW8902 | HEAT SINK ASS'Y | 1TDA6103Q- + 7174300811 | L824 | 58CX430599 | COIL CHOKE | AZ-9004Y 940K TP |
| I901 | 1TDA6103Q- | IC VIDEO | TDA6103Q | LS01 | 5CPZ159M02 | COIL PEAKING | 1.5UH 3.5MM M (LAL02TB) |
| I901A | 4857018902 | HEAT SINK | A1050P-H24 | LS02 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| I901B | 7174300811 | SCREW TAPPTITE | TT2 RND 3X8 MFZN | LS03 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| ICS01 | 1DW760AA1Q | IC CHIP MICOM | DW37760MCA-AA1 | LU01 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| ICY01 | 1LA71550-Q | IC CHIP Y/C | LA71550 | LU02 | 5CPX101J-- | COIL PEAKING | PL 100UH J (TAPPING) |
| IS02 | 1BA6209--- | IC | BA6209(ROHM) | LU03 | 5CPX103J-- | COIL PEAKING | 10MH 5MM J RADIAL |
| IS03 | 1AT24C08PC | IC | AT24C08-10PC | LY01 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| IS04 | 1MN1380L-- | IC COMPARATOR(RESET) | MN1380-L(RESET IC) | LY02 | 5CPZ560K02 | COIL PEAKING | 56UH K (AXIAL 3.5MM) |
| IS05 | 1MN1280R-- | IC | MN1280R | LY03 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| IT01 | 1KRT30---- | IC PREAMP | KRT30 | LY04 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| IZ01 | 1LA70001-- | IC PREAMP | LA70001 (2HD) | LY05 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| J001-J079 | 85801065GY | WIRE COPPER | AWG22 1/0.65 TIN COATING | LZ01 | 5CPZ220K02 | COIL PEAKING | 22UH K (AXIAL 3.5MM) |
| J081-J099 | 85801065GY | WIRE COPPER | AWG22 1/0.65 TIN COATING | M191 | 4851931700 | DECK AS | DRN-7203 |
| J103-J113 | 85801065GY | WIRE COPPER | AWG22 1/0.65 TIN COATING | M192 | 4851923500 | SHIELD CASE AS | DVN-14F7JA |
| J115-J188 | 85801065GY | WIRE COPPER | AWG22 1/0.65 TIN COATING | M194 | 4851937000 | SHIELD TOP AS | 7246200+7246300 |
| JG01-JG02 | 85801065GY | WIRE COPPER | AWG22 1/0.65 TIN COATING | M231 | 97P2316600 | HOLDER AC CORD | NYLON66 UL/CSA |
| JG04 | 85801065GY | WIRE COPPER | AWG22 1/0.65 TIN COATING | M351 | 4853535200 | HOLDER LED | FR HIPS BK |
| JC01-JC02 | HRF8000-EA | R CHIP | 1/8 0 OHM 3216 | M381 | 4853817200 | FRAME MAIN PCB | FR HIPS BK |
| JC04 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | M381A | 7122401611 | SCREW TAPPING | T2S TRS 4X16 MFZN |
| JC05-JC09 | HRF8000-EA | R CHIP | 1/8 0 OHM 3216 | M381B | 7128301212 | SCREW TAPPING | T2S WAS 3X12 MFZN BK |
| JC10 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | M381C | 7121301212 | SCREW TAPPING | T2S PAN 3X12 MFZN BK |
| JC11 | HRF8000-EA | R CHIP | 1/8 0 OHM 3216 | M381D | 7122401612 | SCREW TAPPING | T2S TRS 4X16 MFZN BK |
| JC12-JC13 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | M682 | 4856814900 | CLAMP WIRE | NYLON 66 |
| JC14 | HRF8000-EA | R CHIP | 1/8 0 OHM 3216 | M683 | 4856812001 | TIE CABLE | NYLON66 DA100 |
| JC15 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | P401 | 4859240020 | CONN WAFER | YFW500-05 |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|---------|------------|-----------------|---------------------------|--------|------------|----------------|-------------------------|
| P601 | 485923162S | CONN WAFER | YW025-03 (STICK) | QCY02 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR |
| P802A | 4859242220 | CONN WAFER | YFW800-02 | QCY03 | T2SA1037KB | TR CHIP | 2SA1037AKT146-R |
| P803 | 4850701S06 | CONNECTOR | YFH800-01+YPT018+ULW=300 | QCY04 | T2SA1037KB | TR CHIP | 2SA1037AKT146-R |
| P804 | 4857417500 | TERM PIN | DA-IB0214(D2.3/DY PIN) | QU04 | TKTC3202Y- | TR | KTC3202Y (TP) |
| PA501 | 4850708N08 | CONNECTOR | BIC-08T-25T+C-20T+ULW=400 | QU05 | TKTA1266Y- | TR | KTA1266Y (TP) |
| PAS03 | 4850707V03 | CONNECTOR | 60-8283-3078-45+ULW=100 | R110 | RD-4Z392J- | R CARBON FILM | 1/4 3.9K OHM J |
| PAU01 | 4850706N07 | CONNECTOR | 60-8283-3068-45+USW=250 | R302 | RN01B331JS | R METAL FILM | 1W 330 OHM J SMALL |
| PS01 | 4859278120 | CONN WAFER | TKC-G06P-A1 | R305 | RN01B471JS | R METAL FILM | 1W 470 OHM J SMALL |
| PS02 | 4859278220 | CONN WAFER | TKC-G10P-A1 | R306 | RN01B561JS | R METAL FILM | 1W 560 OHM J SMALL |
| PS04 | 485923182S | CONN WAFER | YW025-05 (STICK) | R307 | RN01B129JS | R METAL FILM | 1W 1.2 OHM J SMALL |
| ⚠ PWC01 | 4859907910 | CORD POWER AS | ME301P+TER=1830 | R308 | RD-4Z273J- | R CARBON FILM | 1/4 27K OHM J |
| PZ01 | 4859245710 | CONN HOUSING | 00-8370-041-000-800 | R312 | RN-4Z1502F | R METAL FILM | 1/4 15K OHM F |
| Q401 | TKTC3207-- | TR | KTC3207 (TP) | R313 | RN-4Z1603F | R METAL FILM | 1/4 160K OHM F |
| Q402 | PTA2SW7200 | HEAT SINK ASS'Y | T2SD2499-- + 7174301011 | R401 | RN02B101JS | R METAL FILM | 2W 100 OHM J SMALL |
| Q402 | T2SD2499-- | TR | 2SD2499 | R402 | RN01B229JS | R METAL FILM | 1W 2.2 OHM J SMALL |
| Q402A | 4857027200 | HEAT SINK | AL T1.0 | R403 | RN01B479JS | R METAL FILM | 1W 4.7 OHM J SMALL |
| Q402B | 7174301011 | SCREW TAPPTITE | TT2 RND 3X10 MFZN | R404 | RN01B229JS | R METAL FILM | 1W 2.2 OHM J SMALL |
| Q402C | 4856215201 | WASHER | SPCC | R409 | RD-4Z472J- | R CARBON FILM | 1/4 4.7K OHM J |
| ⚠ Q801 | PTQ2SW4500 | HEAT SINK ASS'Y | T2SK2564-- + 7174300811 | R410 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| Q801 | T2SK2564-- | FET | 2SK2564 | R414 | RN01B562JS | R METAL FILM | 1W 5.6K OHM J SMALL |
| Q801A | 4857024500 | HEAT SINK | AL EX B/K | R415 | RD-4Z100J- | R CARBON FILM | 1/4 10 OHM J |
| Q801B | 7174300811 | SCREW TAPPTITE | TT2 RND 3X8 MFZN | R417 | RN02B101JS | R METAL FILM | 2W 100 OHM J SMALL |
| Q820 | TKSA1013Y- | TR | KSA1013Y (TP) | R503 | RD-4Z824J- | R CARBON FILM | 1/4 820K OHM J |
| Q821 | TKSA1013Y- | TR | KSA1013Y (TP) | R504 | RD-4Z121J- | R CARBON FILM | 1/4 120 OHM J |
| Q823 | TKSA1013Y- | TR | KSA1013Y (TP) | R505 | RD-4Z201J- | R CARBON FILM | 1/4 200 OHM J |
| QC501 | T2SA1037KB | TR CHIP | 2SA1037AKT146-R | R506 | RD-4Z201J- | R CARBON FILM | 1/4 200 OHM J |
| QC502 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R507 | RD-4Z201J- | R CARBON FILM | 1/4 200 OHM J |
| QC503 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R511 | RD-4Z151J- | R CARBON FILM | 1/4 150 OHM J |
| QC551 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R533 | RD-4Z103J- | R CARBON FILM | 1/4 10K OHM J |
| QC601 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R604 | RN02B339JS | R METAL FILM | 2W 3.3 OHM J SMALL |
| QC822 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R605 | RD-2Z331J- | R CARBON FILM | 1/2 330 OHM J |
| QC824 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | ⚠ R801 | DSVC471D14 | VARISTOR | SVC471D14A |
| QC825 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | ⚠ R802 | RX10B229JN | R CEMENT | 10W 2.2 OHM J BENCH 4P |
| QC826 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R803 | RD-4Z394J- | R CARBON FILM | 1/4 390K OHM J |
| QCS01 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R804 | RD-4Z394J- | R CARBON FILM | 1/4 390K OHM J |
| QCS02 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R805 | RD-4Z333J- | R CARBON FILM | 1/4 33K OHM J |
| QCS03 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R806 | RD-4Z432J- | R CARBON FILM | 1/4 4.3K OHM J |
| QCT01 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R807 | RF02Z228J- | R FUSIBLE | 2W 0.22 OHM J (TAPPING) |
| QCT02 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | ⚠ R816 | DEC7ROM140 | POSISTOR | ECPAC7ROM140 |
| QCT03 | T2SA1037KB | TR CHIP | 2SA1037AKT146-R | R820 | RS02Z828JS | R M-OXIDE FILM | 2W 0.82 OHM J SMALL |
| QCU01 | T2SA1037KB | TR CHIP | 2SA1037AKT146-R | R821 | RD-4Z363J- | R CARBON FILM | 1/4 36K OHM J |
| QCU02 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R826 | RD-4Z100J- | R CARBON FILM | 1/4 10 OHM J |
| QCU03 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R827 | RD-4Z472J- | R CARBON FILM | 1/4 4.7K OHM J |
| QCY01 | T2SC2412KB | TR CHIP | 2SC2412K-T146-BR | R831 | RD-4Z472J- | R CARBON FILM | 1/4 4.7K OHM J |



ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|--------|------------|---------------|----------------------|-------|------------|-----------|----------------------|
| R833 | RD-4Z472J- | R CARBON FILM | 1/4 4.7K OHM J | RC520 | HRFT390JCA | R CHIP | 1/10 39 OHM J 2012 |
| R836 | RN01B124JS | R METAL FILM | 1W 120K OHM J SMALL | RC521 | HRFT914JCA | R CHIP | 1/10 910KOHM J 2012 |
| ⚠ R889 | RC-2Z565KP | R CARBON COMP | 1/2 5.6M OHM K | RC522 | HRFT511JCA | R CHIP | 1/10 510 OHM J 2012 |
| R902 | RN01B152JS | R METAL FILM | 1W 1.5K OHM J SMALL | RC523 | HRFT511JCA | R CHIP | 1/10 510 OHM J 2012 |
| R903 | RN01B152JS | R METAL FILM | 1W 1.5K OHM J SMALL | RC524 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| R904 | RN01B152JS | R METAL FILM | 1W 1.5K OHM J SMALL | RC527 | HRFT223JCA | R CHIP | 1/10 22K OHM J 2012 |
| R905 | RN01B124JS | R METAL FILM | 1W 120K OHM J SMALL | RC528 | HRFT272JCA | R CHIP | 1/10 2.7K OHM J 2012 |
| R906 | RN01B124JS | R METAL FILM | 1W 120K OHM J SMALL | RC529 | HRFT822JCA | R CHIP | 1/10 8.2K OHM J 2012 |
| R907 | RN01B124JS | R METAL FILM | 1W 120K OHM J SMALL | RC530 | HRFT362JCA | R CHIP | 1/10 3.6K OHM J 2012 |
| RC101 | HRFT153JCA | R CHIP | 1/10 15K OHM J 2012 | RC531 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RC102 | HRFT104JCA | R CHIP | 1/10 100K OHM J 2012 | RC532 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RC103 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 | RC534 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RC104 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 | RC541 | HRFT205JCA | R CHIP | 1/10 2M OHM J 2012 |
| RC105 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 | RC542 | HRFT564JCA | R CHIP | 1/10 560K OHM J 2012 |
| RC106 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC551 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RC107 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC552 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RC108 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 | RC553 | HRFT910JCA | R CHIP | 1/10 91 OHM J 2012 |
| RC109 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RC601 | HRFT622JCA | R CHIP | 1/10 6.2K OHM J 2012 |
| RC110 | HRFT153JCA | R CHIP | 1/10 15K OHM J 2012 | RC602 | HRFT242JCA | R CHIP | 1/10 2.4K OHM J 2012 |
| RC112 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC603 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RC113 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC607 | HRFT471JCA | R CHIP | 1/10 470 OHM J 2012 |
| RC301 | HRFT682JCA | R CHIP | 1/10 6.8K OHM J 2012 | RC608 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RC309 | HRFT222JCA | R CHIP | 1/10 2.2K OHM J 2012 | RC609 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RC310 | HRFT333JCA | R CHIP | 1/10 33K OHM J 2012 | RC822 | HRFT363JCA | R CHIP | 1/10 36K OHM J 2012 |
| RC311 | HRFT113JCA | R CHIP | 1/10 11K OHM J 2012 | RC823 | HRFT273JCA | R CHIP | 1/10 27K OHM J 2012 |
| RC314 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | RC824 | HRFT104JCA | R CHIP | 1/10 100K OHM J 2012 |
| RC405 | HRFT153JCA | R CHIP | 1/10 15K OHM J 2012 | RC825 | HRFT104JCA | R CHIP | 1/10 100K OHM J 2012 |
| RC406 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RC828 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RC407 | HRFT433JCA | R CHIP | 1/10 43K OHM J 2012 | RC829 | HRFT304JCA | R CHIP | 1/10 300K OHM J 2012 |
| RC408 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RC830 | HRFT223JCA | R CHIP | 1/10 22K OHM J 2012 |
| RC411 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 | RC832 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RC412 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC834 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RC501 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC835 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RC502 | HRFT682JCA | R CHIP | 1/10 6.8K OHM J 2012 | RC837 | HRFT153JCA | R CHIP | 1/10 15K OHM J 2012 |
| RC508 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RC908 | HRFT202JCA | R CHIP | 1/10 2K OHM J 2012 |
| RC509 | HRFT122JCA | R CHIP | 1/10 1.2K OHM J 2012 | RC909 | HRFT272JCA | R CHIP | 1/10 2.7K OHM J 2012 |
| RC510 | HRFT182JCA | R CHIP | 1/10 1.8K OHM J 2012 | RC910 | HRFT202JCA | R CHIP | 1/10 2K OHM J 2012 |
| RC512 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RC911 | HRFT272JCA | R CHIP | 1/10 2.7K OHM J 2012 |
| RC513 | HRFT152JCA | R CHIP | 1/10 1.5K OHM J 2012 | RC912 | HRFT202JCA | R CHIP | 1/10 2K OHM J 2012 |
| RC514 | HRFT472FCA | R CHIP | 1/10 4.7K OHM F 2012 | RC913 | HRFT272JCA | R CHIP | 1/10 2.7K OHM J 2012 |
| RC515 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCA01 | HRFT104JCA | R CHIP | 1/10 100K OHM J 2012 |
| RC517 | HRFT123JCA | R CHIP | 1/10 12K OHM J 2012 | RCA02 | HRFT101JCA | R CHIP | 1/10 100 OHM J 2012 |
| RC518 | HRFT123JCA | R CHIP | 1/10 12K OHM J 2012 | RCS01 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RC519 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCS02 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|-------|------------|-----------|----------------------|-------|------------|-----------|----------------------|
| RCS03 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCS62 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS06 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | RCS63 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RCS07 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCS64 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS08 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 | RCS65 | HRFT273JCA | R CHIP | 1/10 27K OHM J 2012 |
| RCS09 | HRFT393JCA | R CHIP | 1/10 39K OHM J 2012 | RCS66 | HRFT201JCA | R CHIP | 1/10 200 OHM J 2012 |
| RCS10 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCS67 | HRFT273JCA | R CHIP | 1/10 27K OHM J 2012 |
| RCS11 | HRFT154JCA | R CHIP | 1/10 150K OHM J 2012 | RCS68 | HRFT201JCA | R CHIP | 1/10 200 OHM J 2012 |
| RCS12 | HRFT154JCA | R CHIP | 1/10 150K OHM J 2012 | RCS69 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RCS14 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCS70 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RCS15 | HRFT362JCA | R CHIP | 1/10 3.6K OHM J 2012 | RCS71 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS16 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 | RCS72 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS17 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCS73 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS18 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCS74 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS19 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCS75 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS22 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCS76 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS23 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCS77 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS24 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCS78 | HRFT101JCA | R CHIP | 1/10 100 OHM J 2012 |
| RCS25 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCS79 | HRFT332JCA | R CHIP | 1/10 3.3K OHM J 2012 |
| RCS28 | HRFT223JCA | R CHIP | 1/10 22K OHM J 2012 | RCS81 | HRFT182JCA | R CHIP | 1/10 1.8K OHM J 2012 |
| RCS29 | HRFT000-CA | R CHIP | 1/10 0 OHM 2012 | RCS82 | HRFT182JCA | R CHIP | 1/10 1.8K OHM J 2012 |
| RCS30 | HRFT106JCA | R CHIP | 1/10 10M OHM J 2012 | RCS84 | HRFT332JCA | R CHIP | 1/10 3.3K OHM J 2012 |
| RCS31 | HRFT104JCA | R CHIP | 1/10 100K OHM J 2012 | RCS85 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RCS32 | HRFT105JCA | R CHIP | 1/10 1M OHM J 2012 | RCS86 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |
| RCS33 | HRFT511JCA | R CHIP | 1/10 510 OHM J 2012 | RCS87 | HRFT471JCA | R CHIP | 1/10 470 OHM J 2012 |
| RCS35 | HRFT751JCA | R CHIP | 1/10 750 OHM J 2012 | RCT02 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RCS36 | HRFT471JCA | R CHIP | 1/10 470 OHM J 2012 | RCT03 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 |
| RCS37 | HRFT105JCA | R CHIP | 1/10 1M OHM J 2012 | RCT04 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 |
| RCS38 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT05 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RCS39 | HRFT471JCA | R CHIP | 1/10 470 OHM J 2012 | RCT06 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RCS40 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCT08 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 |
| RCS46 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT09 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RCS47 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT11 | HRFT911JCA | R CHIP | 1/10 910 OHM J 2012 |
| RCS48 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT12 | HRFT132JCA | R CHIP | 1/10 1.3K OHM J 2012 |
| RCS49 | HRFT392JCA | R CHIP | 1/10 3.9K OHM J 2012 | RCT13 | HRFT202JCA | R CHIP | 1/10 2K OHM J 2012 |
| RCS50 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT14 | HRFT332JCA | R CHIP | 1/10 3.3K OHM J 2012 |
| RCS51 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT15 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |
| RCS52 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 | RCT17 | HRFT911JCA | R CHIP | 1/10 910 OHM J 2012 |
| RCS53 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 | RCT18 | HRFT132JCA | R CHIP | 1/10 1.3K OHM J 2012 |
| RCS54 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT19 | HRFT202JCA | R CHIP | 1/10 2K OHM J 2012 |
| RCS55 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | RCT20 | HRFT332JCA | R CHIP | 1/10 3.3K OHM J 2012 |
| RCS56 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 | RCU01 | HRFT683JCA | R CHIP | 1/10 68K OHM J 2012 |
| RCS57 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 | RCU02 | HRFT562JCA | R CHIP | 1/10 5.6K OHM J 2012 |
| RCS60 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCU03 | HRFT105JCA | R CHIP | 1/10 1M OHM J 2012 |
| RCS61 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCU04 | HRFT392JCA | R CHIP | 1/10 3.9K OHM J 2012 |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|-------|------------|-----------|----------------------|---|------------|---------------|------------------------|
| RCU07 | HRFT122JCA | R CHIP | 1/10 1.2K OHM J 2012 | RCY25 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RCU08 | HRFT122JCA | R CHIP | 1/10 1.2K OHM J 2012 | RCY26 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RCU09 | HRFT272JCA | R CHIP | 1/10 2.7K OHM J 2012 | RCZ01 | HRFT473JCA | R CHIP | 1/10 47K OHM J 2012 |
| RCU10 | HRFT122JCA | R CHIP | 1/10 1.2K OHM J 2012 | RCZ02 | HRFT183JCA | R CHIP | 1/10 18K OHM J 2012 |
| RCU11 | HRFT273JCA | R CHIP | 1/10 27K OHM J 2012 | RCZ03 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 |
| RCU12 | HRFT223JCA | R CHIP | 1/10 22K OHM J 2012 | RCZ04 | HRFT152JCA | R CHIP | 1/10 1.5K OHM J 2012 |
| RCU13 | HRFT223JCA | R CHIP | 1/10 22K OHM J 2012 | RCZ06 | HRFT471JCA | R CHIP | 1/10 470 OHM J 2012 |
| RCU14 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 | RCZ09 | HRFT220JCA | R CHIP | 1/10 22 OHM J 2012 |
| RCU15 | HRFT512JCA | R CHIP | 1/10 5.1K OHM J 2012 | RCZ10 | HRFT751JCA | R CHIP | 1/10 750 OHM J 2012 |
| RCU16 | HRFT103JCA | R CHIP | 1/10 10K OHM J 2012 |  RLY01 | 5SC0101338 | SW RELAY | DQ5D1-Q(M)/GJ-SS-105LM |
| RCU19 | HRFT152JCA | R CHIP | 1/10 1.5K OHM J 2012 | RS13 | RD-4Z121J- | R CARBON FILM | 1/4 120 OHM J |
| RCU20 | HRFT229JCA | R CHIP | 1/10 2.2 OHM J 2012 | RS26 | RD-4Z101J- | R CARBON FILM | 1/4 100 OHM J |
| RCU21 | HRFT229JCA | R CHIP | 1/10 2.2 OHM J 2012 | RS27 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCU22 | HRFT334JCA | R CHIP | 1/10 330K OHM J 2012 | RS41 | RD-4Z472J- | R CARBON FILM | 1/4 4.7K OHM J |
| RCU23 | HRFT123JCA | R CHIP | 1/10 12K OHM J 2012 | RS42 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCU24 | HRFT221JCA | R CHIP | 1/10 220 OHM J 2012 | RS43 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCU25 | HRFT822JCA | R CHIP | 1/10 8.2K OHM J 2012 | RS44 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCU26 | HRFT152JCA | R CHIP | 1/10 1.5K OHM J 2012 | RS45 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCU27 | HRFT101JCA | R CHIP | 1/10 100 OHM J 2012 | RS58 | RD-4Z471J- | R CARBON FILM | 1/4 470 OHM J |
| RCU28 | HRFT512JCA | R CHIP | 1/10 5.1K OHM J 2012 | RS59 | RD-4Z471J- | R CARBON FILM | 1/4 470 OHM J |
| RCU29 | HRFT683JCA | R CHIP | 1/10 68K OHM J 2012 | RS83 | RN02B339JS | R METAL FILM | 2W 3.3 OHM J SMALL |
| RCU30 | HRFT512JCA | R CHIP | 1/10 5.1K OHM J 2012 | RS88 | RD-4Z103J- | R CARBON FILM | 1/4 10K OHM J |
| RCV01 | HRFT750JCA | R CHIP | 1/10 75 OHM J 2012 | RS90 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCV02 | HRFT101JCA | R CHIP | 1/10 100 OHM J 2012 | RS91 | RD-4Z102J- | R CARBON FILM | 1/4 1K OHM J |
| RCY01 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 | RT01 | RD-4Z240J- | R CARBON FILM | 1/4 24 OHM J |
| RCY02 | HRFT331JCA | R CHIP | 1/10 330 OHM J 2012 | RT10 | RD-4Z681J- | R CARBON FILM | 1/4 680 OHM J |
| RCY03 | HRFT122JCA | R CHIP | 1/10 1.2K OHM J 2012 | RT16 | RD-4Z681J- | R CARBON FILM | 1/4 680 OHM J |
| RCY04 | HRFT332JCA | R CHIP | 1/10 3.3K OHM J 2012 | RU17 | RD-4Z561J- | R CARBON FILM | 1/4 560 OHM J |
| RCY05 | HRFT152JCA | R CHIP | 1/10 1.5K OHM J 2012 | RU18 | RD-4Z470J- | R CARBON FILM | 1/4 47 OHM J |
| RCY06 | HRFT472JCA | R CHIP | 1/10 4.7K OHM J 2012 |  SCT01 | 4859303430 | SOCKET CRT | PCS633A |
| RCY07 | HRFT122JCA | R CHIP | 1/10 1.2K OHM J 2012 | SS01 | TST5811--- | TR PHOTO | ST-5811 |
| RCY08 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | SS01A | 97P2343500 | HOLDER TR | ABS FR |
| RCY11 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | SS02 | TST5811--- | TR PHOTO | ST-5811 |
| RCY12 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | SS02A | 97P2343500 | HOLDER TR | ABS FR |
| RCY13 | HRFT223JCA | R CHIP | 1/10 22K OHM J 2012 | SS03 | 1SG239S--- | IC SENSOR | SG-239S |
| RCY14 | HRFT511JCA | R CHIP | 1/10 510 OHM J 2012 | SS04 | 1SG239S--- | IC SENSOR | SG-239S |
| RCY15 | HRFT201JCA | R CHIP | 1/10 200 OHM J 2012 | SWS01 | 5SN0101Z20 | SW DETECT | JDS1105-6X |
| RCY16 | HRFT201JCA | R CHIP | 1/10 200 OHM J 2012 | SWT01 | 5S50101090 | SW TACT | SKHV17910A |
| RCY17 | HRFT182JCA | R CHIP | 1/10 1.8K OHM J 2012 | SWT02 | 5S50202002 | SW TACT | KPT-2105A 2C-2P |
| RCY18 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | SWT03 | 5S50202002 | SW TACT | KPT-2105A 2C-2P |
| RCY19 | HRFT182JCA | R CHIP | 1/10 1.8K OHM J 2012 | SWT04 | 5S50101090 | SW TACT | SKHV17910A |
| RCY20 | HRFT822JCA | R CHIP | 1/10 8.2K OHM J 2012 | SWT05 | 5S50101090 | SW TACT | SKHV17910A |
| RCY21 | HRFT182JCA | R CHIP | 1/10 1.8K OHM J 2012 | SWT06 | 5S50101090 | SW TACT | SKHV17910A |
| RCY24 | HRFT102JCA | R CHIP | 1/10 1K OHM J 2012 | SWT07 | 5S50101090 | SW TACT | SKHV17910A |

ELECTRICAL PARTS LIST

| LOC | PART CODE | PART NAME | DESCRIPTION | LOC | PART CODE | PART NAME | DESCRIPTION |
|--------|------------|----------------|-------------|-------|------------|---------------------|---------------------------|
| SWT08 | 5S50101090 | SW TACT | SKHV17910A | X501 | 5XE3R5795C | CRYSTAL QUARTZ | HC-49/U 3.579545MHZ 20PPM |
| T401 | 50D0000022 | TRANS DRIVE | HD-15D | XCS01 | HXA32R768C | CRYSTAL CHIP QUARTZ | 32.768KHZ 20PPM 8038 |
| ⚠ T402 | 50H0000198 | FBT | FSA37012M | XS02 | 5XJ16R000E | CRYSTAL QUARTZ | HC-49S 16.000000MHZ 30PPM |
| ⚠ T802 | 50M3541T3- | TRANS SMPS | TSM-3541T3 | XY01 | 5XE3R5795B | CRYSTAL QUARTZ | HC-49/U 3.579545MHZ 15PPM |
| TU01 | 5800000032 | COIL OSC | DE0-006 | Z101 | 5PTS5221P | FILTER SAW | TSF5221P |
| ⚠ U102 | 4859719130 | TUNER VARACTOR | DT5-NF20F | Z102 | 5PXPS45MB- | FILTER CERA | TPS-4.5MB TRAP (TAPPING) |

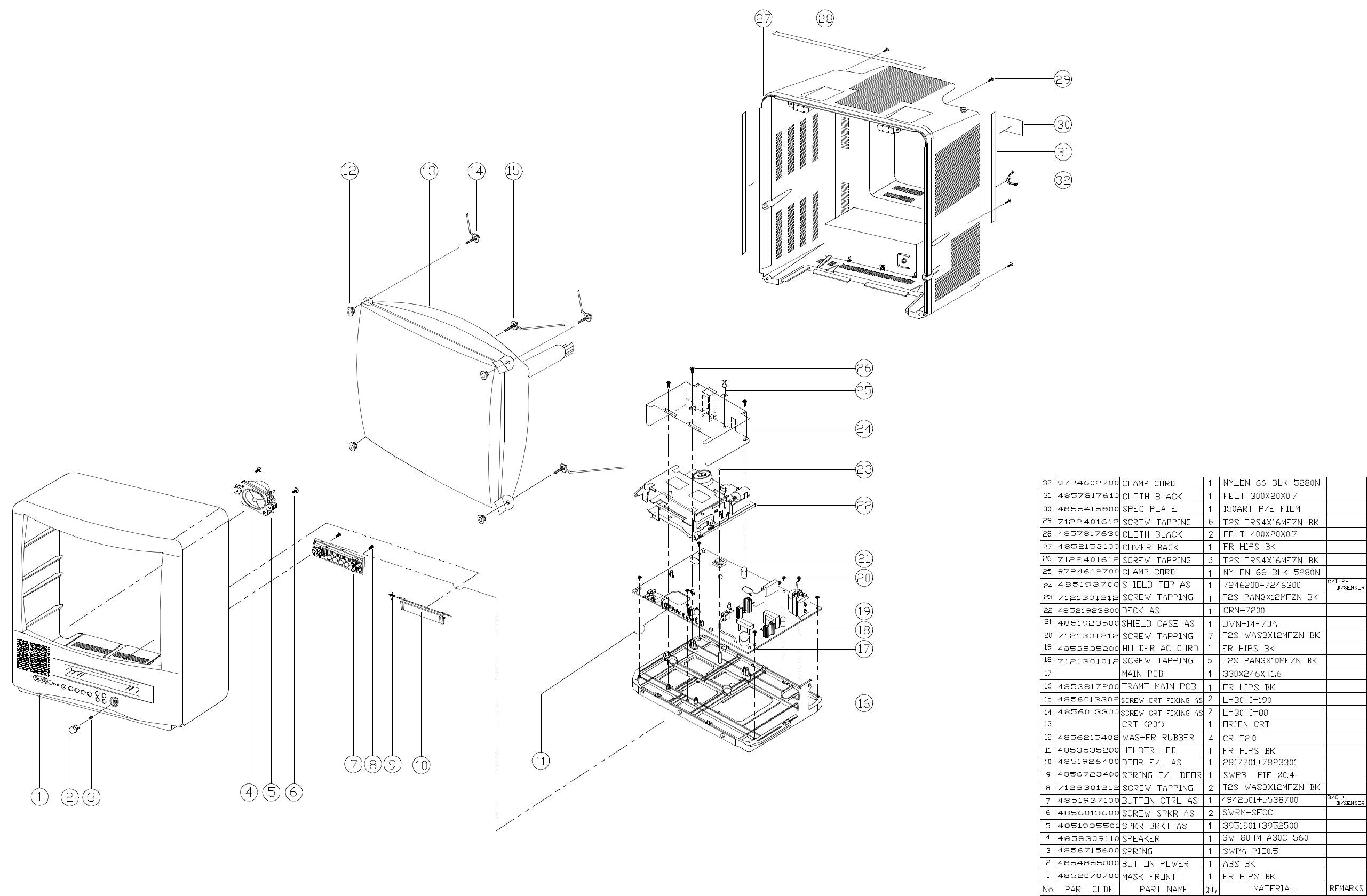
☐ OPTION PARTS LIST

1. CN-071 13" / 19" DIFFERENT PARTS LIST

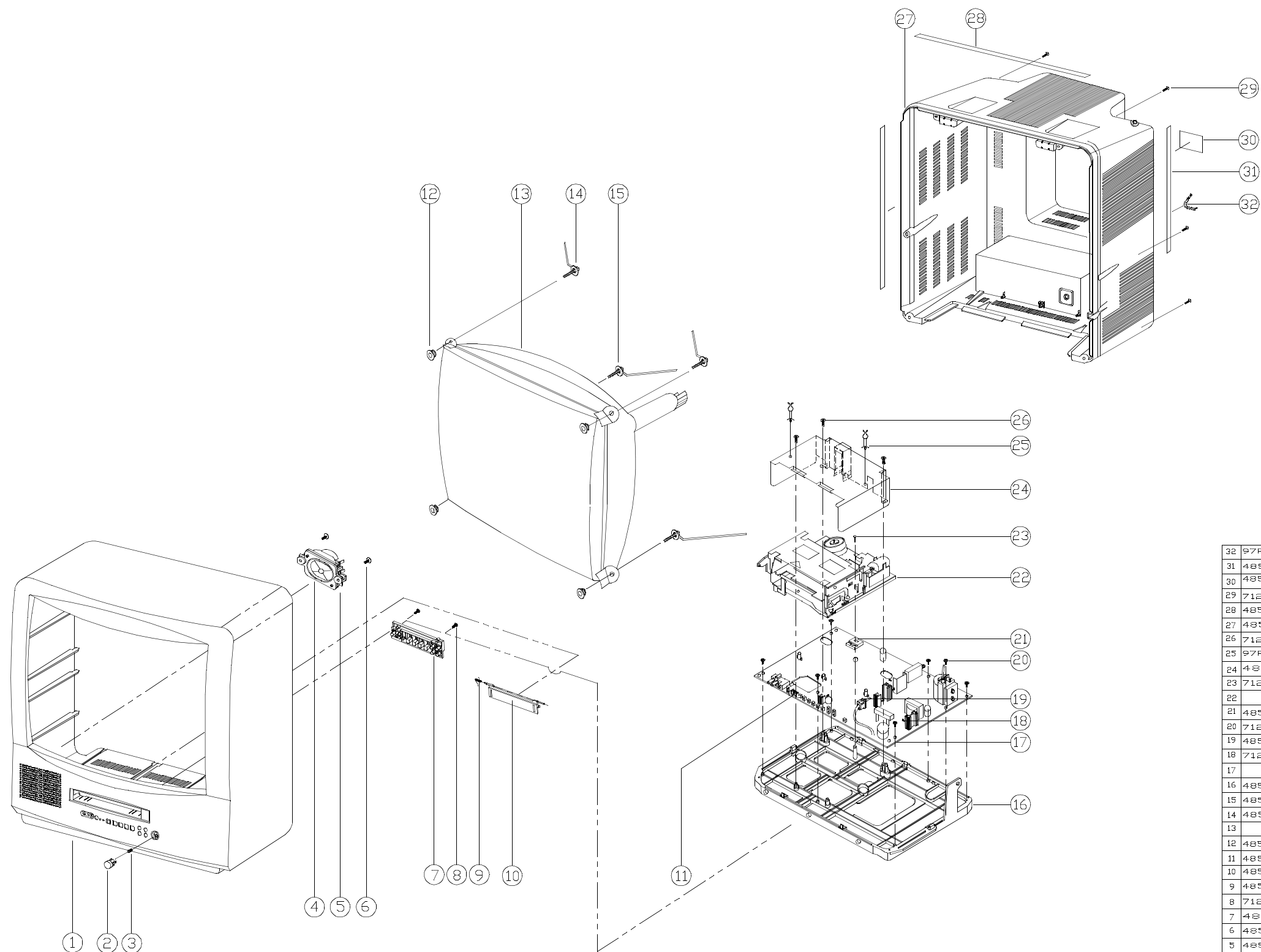
| LOC | PART NAME | DVQ-13H1FC | | DVQ-19H1FC | | REMARK |
|-------|--------------------|------------|------------------------|------------|------------------------|----------|
| | | PART CODE | DESCRIPTION | PART CODE | DESCRIPTION | |
| 0001 | ANT ROD | 4850A02510 | S3BW216B (L=600 MM) | X | | OPTION |
| 0003 | TRANS ANT MATCHING | 4850A00250 | IMT-06 | X | | OPTION |
| C402 | C MYLAR | CMYH3C692J | 1.6KV BUP 6900PF J | CMYH3C622J | 1.6KV BUP 6200PF J | RETRACE |
| PA601 | CONNECTOR | 4850703S53 | YH025-03+35098+ULW=500 | 4850703S50 | YH025-03+35098+ULW=200 | |
| Q402A | HEAT SINK | X | | 4857027200 | AL T1.0 | |
| Q402B | SCREW TAPPTITE | X | | 7174301011 | TT2 RND 3X10 MFZN | |
| Q402C | WASHER | X | | 4856215201 | SPCC | |
| R306 | R METAL FILM | RN01B471JS | 1W 470 OHM J SMALL | RN01B561JS | 1W 560 OHM J SMALL | V CENTER |
| R403 | R METAL FILM | RN01B369JS | 1W 3.6 OHM J SMALL | RN01B479JS | 1W 4.7 OHM J SMALL | HEATER |
| RC406 | R CHIP | HRFT113JCA | 1/10 11K OHM J 2012 | HRFT103JCA | 1/10 10K OHM J 2012 | X-RAY |
| RC502 | R CHIP | HRFT822JCA | 1/10 8.2K OHM J 2012 | HRFT682JCA | 1/10 6.8K OHM J 2012 | ABL |
| RC823 | R CHIP | HRFT363JCA | 1/10 36K OHM J 2012 | HRFT273JCA | 1/10 27K OHM J 2012 | OCP |
| V01 | COIL DY | 58D0000082 | ODY-M1489 | 58D0000083 | ODY-M2050 | |
| V901 | CRT BARE | 48A96414N1 | A34JLL40X | 48A96420N1 | A48JLL40X(W) | |
| ZZ131 | CRT GROUND NET | 48519A4710 | 1401S-1015-1P | 48519A5110 | 2001S-1015-1P | |
| ZZ132 | COIL DEGAUSSING | 58G0000078 | DC-1400 | 58G0000122 | DC-2030 | |

EXPLODED VIEW

1. DVQ-19H2FC

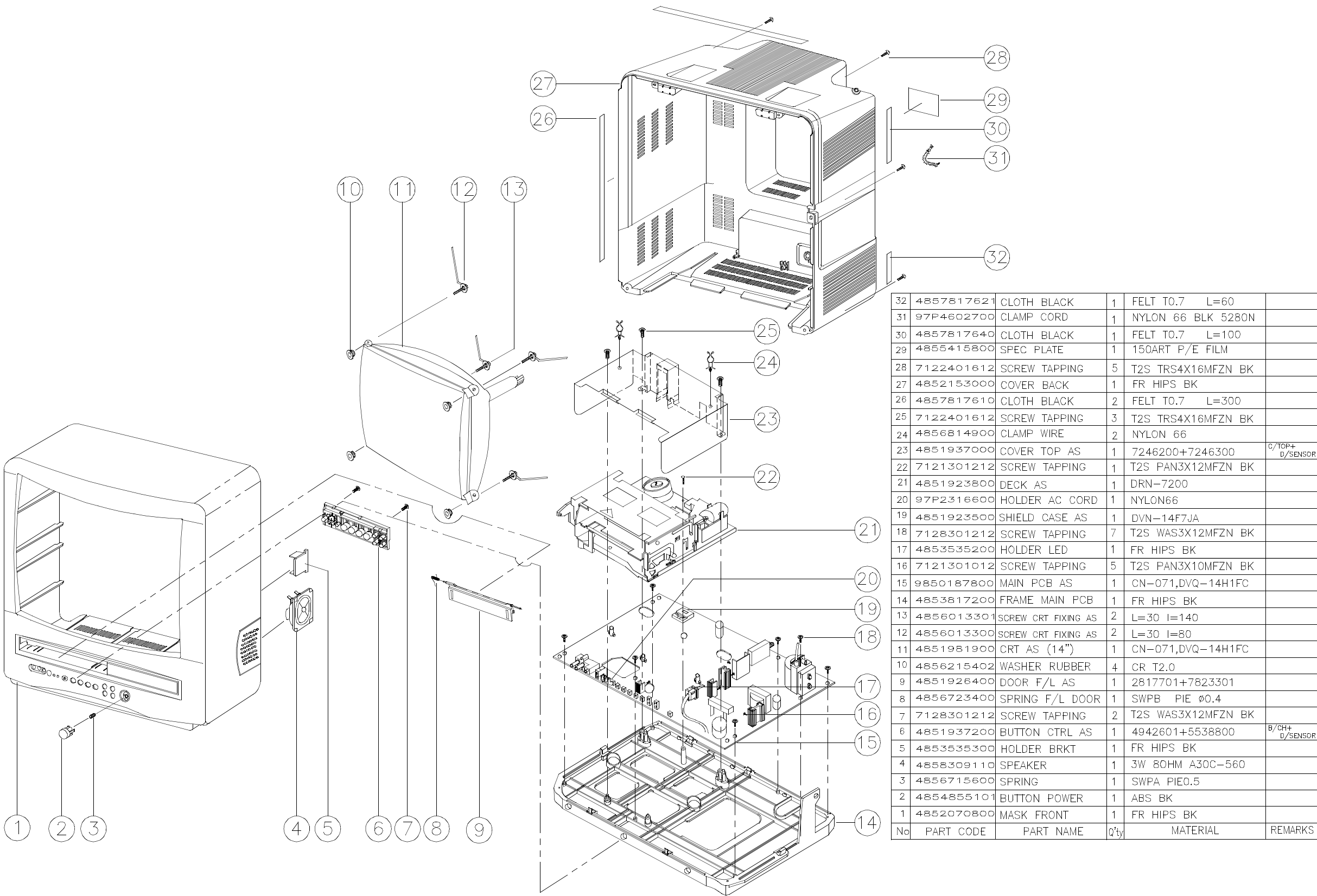


2. DVQ-19H1FC

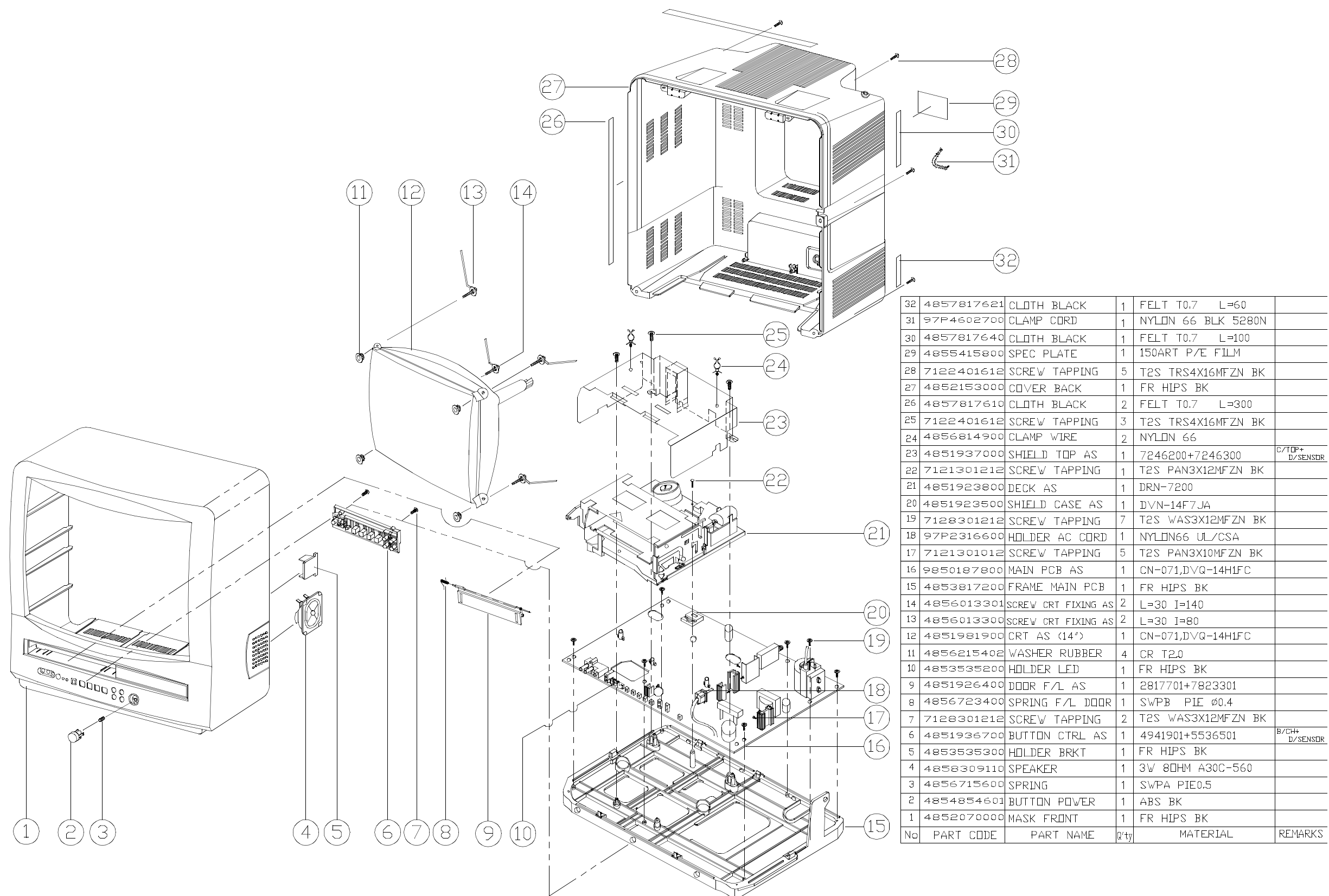


| | | | | | |
|----|------------|---------------------|-----|--------------------|--------------------|
| 32 | 97P4602700 | CLAMP CORD | 1 | NYLON 66 BLK 5280N | |
| 31 | 4857817610 | CLOTH BLACK | 1 | FELT 300X20X0.7 | |
| 30 | 4855415800 | SPEC PLATE | 1 | 150ART P/E FILM | |
| 29 | 7122401612 | SCREW TAPPING | 6 | T2S TRS4X16MFZN BK | |
| 28 | 4857817630 | CLOTH BLACK | 2 | FELT 400X20X0.7 | |
| 27 | 4852153100 | COVER BACK | 1 | FR HIPS BK | |
| 26 | 7122401612 | SCREW TAPPING | 3 | T2S TRS4X16MFZN BK | |
| 25 | 97P4602700 | CLAMP CORD | 2 | NYLON 66 BLK 5280N | |
| 24 | 485193700 | SHIELD TOP AS | 1 | 7246200+7246300 | C/TOF+ B/SENSOR |
| 23 | 7121301212 | SCREW TAPPING | 1 | T2S PAN3X12MFZN BK | |
| 22 | | DECK AS | 1 | | |
| 21 | 4851923500 | SHIELD CASE AS | 1 | DVN-14F7JA | |
| 20 | 7128301212 | SCREW TAPPING | 7 | T2S WAS3X12MFZN BK | |
| 19 | 4853535200 | HOLDER AC CORD | 1 | FR HIPS BK | |
| 18 | 7121301012 | SCREW TAPPING | 5 | T2S PAN3X10MFZN BK | |
| 17 | | MAIN PCB | 1 | 330X246X+1.6 | |
| 16 | 4853817200 | FRAME MAIN PCB | 1 | FR HIPS BK | |
| 15 | 4856013302 | SCREW CRT FIXING AS | 2 | L=30 I=190 | |
| 14 | 4856013300 | SCREW CRT FIXING AS | 2 | L=30 I=80 | |
| 13 | | CRT (20") | 1 | ORION CRT | |
| 12 | 4856215402 | WASHER RUBBER | 4 | CR T2.0 | |
| 11 | 4853535200 | HOLDER LED | 1 | FR HIPS BK | |
| 10 | 4851926400 | DOOR F/L AS | 1 | 2817701+7823301 | |
| 9 | 4856723400 | SPRING F/L DOOR | 1 | S/WPB PJE Ø0.4 | |
| 8 | 7128301212 | SCREW TAPPING | 2 | T2S WAS3X12MFZN BK | |
| 7 | 485193680 | BUTTON CTRL AS | 1 | 4942001+5538300 | B/CH+ B/SENSOR |
| 6 | 4856013600 | SCREW SPKR AS | 2 | S'WRM+SECC | |
| 5 | 4851935501 | SPKR BRKT AS | 1 | 3951901+3952500 | |
| 4 | 4858309110 | SPEAKER | 1 | 3W 80HM A30C-560 | |
| 3 | 4856715600 | SPRING | 1 | S/WPA PIE0.5 | |
| 2 | 4854854701 | BUTTON POWER | 1 | ABS BK | |
| 1 | 4852070100 | MASK FRONT | 1 | FR HIPS BK | |
| No | PART CODE | PART NAME | Qty | MATERIAL | REMARKS |

3. DVQ-13H2FC



4. DVQ-13H1FC



DAEWOO

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